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# POPULATION TODAY

Vol. 13, No. 10 October 1985

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Lawrence Pelosi

Chinese American father and son in San Francisco. See page 2.

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# High-Achieving Asian Americans Are Fastest Growing Minority

Asian Americans number 5.1 million as of Sept. 30, 1985, up nearly 50 percent over the 3.5 million counted in the April 1, 1980 U.S. Census, estimate the authors of PRB's *Bulletin* for October, "Asian Americans: Growth, Change, and Diversity." Though still just 2.1 percent of the U.S. population, they are increasing at a far faster rate than the black and Hispanic minorities and, barring major changes in U.S. immigration policy, could total nearly 10 million by 2000.

Carl Haub

This young Korean American boy plays catcher.

Unlike earlier immigrants from Asia who were predominantly poorly educated laborers, today's Asian Americans are generally outperforming even the U.S. white majority in the classroom and workplace, say authors Robert Gardner, Bryant Robey, and Peter Smith, though some—particularly the latest arrived Indochinese refugees—still fall short of the popular image of a "model minority."

Gardner and Smith are Research Associates with the Population Institute of Honolulu's East-West Center and Gardner is PRB's Mellon Visiting Scholar for 1985-1986. Robey, founding editor of *American Demographics* magazine, is Director of Public Affairs for the East-West Center. Their *Bulletin* is the first comprehensive report on how Asian Americans are faring, made possible by special tabulations from the 1980 Census, the only source of detailed national data on the different Asian groups. Later survey data have permitted a look at the some 400,000 Indochinese refugees who arrived too late to be included in the 1980 Census.

The *Bulletin* focuses on the six largest Asian American groups: Chinese (21 percent of the total in 1985), about to be dislodged from first place by Filipinos (20 percent in 1985), followed by Japanese (15 percent), Vietnamese (12 percent but growing fastest of the six groups), Koreans (11 percent), and Asian Indians (10 percent).

## Population on the Rise

Asian American numbers, under a million in 1960, took off with the 1965 U.S. immigration law change which abolished restrictions that had severely limited immigration from Asia and shifted to a system giving preference to close relatives of U.S. residents. To this was added the influx of over 700,000 Indochinese refugees after the end of the Vietnam War in 1975. By 1980-1984, Asians accounted for 48 percent of legal immigrants admitted to the U.S., compared with the 35 percent of legal immigrants from Latin America and the mere 12 percent from Europe. Some 43 percent of Asian Americans in the six largest groups tallied in the 1980 Census said they had arrived since 1970.

Though Asian Americans are visible throughout the U.S., the 1980 Census found 49 percent of them clustered in California and Hawaii and another 9 percent in New York State, the *Bulletin* authors report. Fully 92 percent, compared to 75 percent of the general

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# U.S.'s AIDS Population Stands At 13,000 Cases and Growing

The year 1985 may be remembered as the year AIDS (acquired immunodeficiency syndrome) first made an impact on the U.S. public consciousness as a national health threat. Five years ago, the disease, which is 100-percent fatal, was unknown; today, it is viewed by both public health specialists and the population at large as a national health problem of potentially historic proportions—even though the incidence of AIDS in the U.S. is perhaps one-thirtieth as common as, say, lung cancer (another usually fatal disease).

AIDS is caused by a virus that is spread by exchange of bodily fluids, either by sexual contact, blood transfusions, or poor sanitation that makes fluid exchange inevitable. AIDS is not in fact very contagious; prolonged or repeated contacts seem to be necessary for the disease to spread. Samples suggest that in addition to AIDS victims, a much larger population of people exists who are asymptomatic AIDS carriers.

The first known cases of AIDS in humans occurred in Africa in the late 1970s; the first cases in the U.S. were reported in New York and Los Angeles in June of 1981. The disease may have mutated into existence from an inactive virus carried by green monkeys. Cases are, for the most part, limited to the U.S. and parts of sub-Saharan Africa.

Although AIDS is chiefly associated in the U.S. with male homosexuals, in Africa, AIDS victims appear to be equally male and female. In the "AIDS belt" of Kenya, Uganda, and Tanzania, one estimate puts the number of AIDS carriers (not those afflicted) at perhaps 5 percent of the populations.

In the U.S. there are now an estimated 13,000 AIDS cases, of whom only about 7 percent are women. As of Sept. 23, 1985, 6,830 had died from the disease. At the present time, the number of cases doubles

*Continued on next page*

# The UN's 40 Years in Population

October 24 marks the 40th anniversary of the founding of the United Nations. Almost from the start, the UN was active in supplying demographic data as well as analyzing policy implications of population change. As a salute to the UN and its efforts on behalf of demographers, policymakers, and the general public everywhere, *PT* presents the highlights of the UN's four decades of population achievement:

**1946** The Population Commission, the world's first international body concerned with population, is formed. Composed of experts from around the world, the Commission advises the Economic and Social Council on the impact of population and demographic issues.

Also in this year the Population Division is formed within the UN Secretariat to carry out the studies and administer the programs recommended by the Population Commission and other UN bodies. The Division monitors world population trends and policies and produces valuable population estimates, assessments, and reports, all with a strict commitment to scientific objectivity.

**1948** The UN Statistical Office produces the first annual *Demographic Yearbook*.

**1952** Technical assistance on family planning is provided for the first time, in this instance to India.

**1953** The Population Division publishes its pioneering study, *The Determinants and Consequences of Population Trends*, summarizing the state of knowledge and hypotheses concerning the factors affecting population trends and the effects of these trends on economic and social conditions.

**1954** The first World Population Conference under UN auspices, cosponsored by the International Union for the Scientific Study of Population (IUSSP), meets in Rome in August and September. It is a purely scientific gathering adopting no resolutions or recommendations to governments.

**1962** The UN General Assembly recognizes for the first time a close relationship between economic development and population growth.

**1965** The second World Population Conference is held in Belgrade, Yugoslavia, under the auspices of the UN and the IUSSP. Topics include fertility and family planning, and the nontechnical document from the Conference, entitled *World Population: Challenge to Development*, is widely distributed.

Also in this year, at the urging of the Population Commission, the Economic and Social Council recommends that the UN take a more active role in population, including the development of population programs, the provision of technical assistance, and collection of statistics.

**1966** The UN study *World Population Prospects as Assessed in 1963* is published, drawing global attention to the projected acceleration in population growth, the first in a series of reports on world population prospects.

**1967** A trust fund for population activities is set up with the first donation of $100,000 from the government of Denmark.

**1968** The International Conference on Human Rights in Tehran declares that "couples have a basic human right to decide freely and responsibly on the number and spacing of their children and a right to adequate education and information in this respect."

Also, an interagency Sub-Committee on Population is established as a subsidiary body by the heads of all organizations in the UN system.

**1969** The trust fund established in 1967 becomes the basis of the United Nations Fund for Population Activities (UNFPA). The Fund is to be made available for assistance to governments upon their request for a whole range of population activities. Rafael M. Salas is named Director of the Fund (a position he continues to hold today).

**1970** The General Assembly designates 1974 as "World Population Year" to focus international attention on population's many components, and to foster international cooperation.

**1973** A second edition of the groundbreaking *Determinants and Consequences of Population Trends* (first published in 1953) is published.

**1974** The World Population Year takes place. Its highlight is the World Population Conference in Bucharest, jointly funded by the UN and the UNFPA. The Conference produces the World Population Plan of Action, the first universal consensus document agreeing on action in the field of population.

**1979** The Population Division publishes the first five-year review of the World Population Plan of Action.

**1980** In honor of the thirtieth anniversary of the publication of the first *Demographic Yearbook*, the Statistical Office issues an historical supplement to the 1978 *Demographic Yearbook*, which contains 30-year trends for vital demographic data.

**1984** The International Conference on Population, held in Mexico City, assesses and reaffirms the 1974 World Population Plan of Action.

## FROM THE EDITOR'S DESK

"Lies, damn lies, and statistics." The implication of this old saw is that the glamour of statistics is such that even a sprinkle of them render the victim powerless to resist your argument.

If only it were so! And yet...

We have heard, with our own editorial ears, population "experts" claim that "world population doubles every 20 years." We have heard other so-called experts point out just as stringently that "fertility in the LDCs has been halved in the last 30 years."

Most remarkable.* But more remarkable yet is how such devastating pronouncements neither made the public hide under their beds nor declare total victory over population problems.

You could draw any of several conclusions from the public's nonreaction. One is that they don't listen to population experts (hmmmm...). Another is that they are statistics-tone-deaf. A third is that, pummeled for years, they now live on the other side of the Statistical Credibility Gap.

How about a fourth possibility? Isn't it possible that people don't always need to think quantitatively? That (heresy, heresy!) there's room in this world for the ol' qualitative gut feeling? Even about such statistically knotty issues as crime prevalence, or economic recovery, or even—population growth.

*—Art Haupt*

**World population would double every 41 years at current rates. The LDC total fertility rate has fallen from about 6.1 to 4.2 in the past 30 years.*

## AIDS

*Continued from previous page*

every 10 months. The population of asymptomatic cases may run another 500,000 to 1 million.

While the whole U.S. population could ultimately become infected, statistically speaking, the difficulty of transmission should prevent such an event from happening. But at what level AIDS might plateau is hard to say. There are, however, diseases of precedent: perhaps the most relevant being hepatitis B (serum hepatitis), the most serious form of hepatitis, with a case fatality rate of about 1.6 percent overall.

Like AIDS, hepatitis B is spread by intimate contact and transmission of bodily fluids. Groups considered most at risk in the U.S. include male homosexuals, drug addicts, medical personnel, and the institutionalized.

Hepatitis B has not taken over the world. But it remains one of the world's most common serious, infectious diseases. In China, 15 percent of the population are estimated to be hepatitis carriers, and primary liver cancer, which can be caused by hepatitis B, is the leading cause of death among adults there.

In the U.S., which has a relatively low hepatitis rate compared to other countries, there are 250,000 new infections of hepatitis B per year; half are asymptomatic. There is a pool of 750,000 to 1 million who are chronic carriers of the disease and can transmit it to anyone.

In the early 1970s, a test to detect hepatitis B was developed which has helped protect the medical blood supply. A vaccine came into use in 1981, but in the U.S. this vaccine has been used only in the hepatitis high-risk groups listed above, because it currently costs $100 a dose. (In fact, despite the vaccine, hepatitis B incidence rates have gone up since 1979.) The vaccine is hardly used at all in less developed countries—yet another example of where existence of high tech is not synonymous with availability of high tech.

A problem with using hepatitis B as an AIDS analogy is that no one knows how long it took the former disease to gain a foothold in the human population and spread. If thousands of years were required for hepatitis to build up to 15 percent in China, for example, that might have encouraging implications for the containment of AIDS. Nevertheless, if AIDS, a 100-percent fatal disease, were to spread anything like as widely as hepatitis, the results would be devastating. □

## SURVEY REPORT

### Thailand CPS

Thailand has had a national policy aimed at reducing population growth since 1970. That policy, supported by large private family planning programs, has been one of the most successful in the less developed countries. The country's rate of natural increase dropped from 3.2 percent in the late 1950s to about 1.9 percent in 1984.

From the results of the 1984 Contraceptive Prevalence Survey (CPS3), a total fertility rate (TFR) of about 3.5 lifetime births per woman can be estimated; this compares with a TFR of 3.7 in CPS2 in 1981. Will Thailand's sharp birth rate decline level off or will the rate continue toward the "two-child family" necessary for eventual population stabilization? The survey provides some hints.

When asked the number of children they themselves expected to have, the respondents' average answer was 3.3. This represents a slight drop from the 3.5 expected children of 1981's CPS2. While the average number of expected children declined in 1984, the number of children considered ideal actually rose slightly from 2.9 to 3.0. Given this scenario, will Thailand's TFR level off when it approaches the 3.0 mark?

There was an almost universal awareness among the survey respondents of modern contraceptive methods such as the pill, female sterilization, and the IUD, evidence of the promotion of specific contraceptive methods by the National Family Planning Program. "Traditional" methods such as rhythm and withdrawal had much lower recognition rates, even when prompted by the interviewer.

Thailand's contraceptive prevalence is approaching the standards of the more developed countries with 65 percent of currently married women using some form of family planning at the time of the survey. Since CPS2 in 1981, female sterilization has become the leading method with 23.5 percent of the currently married women reporting that they were sterilized. The pill was second at 19.8 percent and injectables third at 7.6 percent.

Thus, Thailand, with a relatively high life expectancy at birth of 63 years and a high and apparently rising level of contraceptive use, appears to be far along the path of the "demographic transition" to birth and death rates more like those of a developed country. However, with the ideal number of children still at 3, it may be that Thai women will use family planning to space their 3 children rather than limit family size to the 2 children necessary for eventual population stabilization. These developments will have a significant impact on any population projections for the country. □

## WORLD FOOD NEWS

FAO Director-General Edouard Saouma has called for broad action to conserve the world's dwindling forest resources, particularly in the tropics where "the crisis of poverty" is gravely affecting forestry, agriculture, even human nutrition.

The most dramatic manifestation of this crisis is the problem of fuelwood, involving about 2 billion people, Saouma declared. Of these, more than half are mining available supplies, cutting wood faster than it is being replaced, he said. Shortages of fuelwood have been reported in areas of Africa and Asia.

Current trends for the developing world as a whole show a deficit in wood running to more than 900 million cubic meters annually by the year 2000. This is the energy equivalent of some 4 million barrels of oil a day, according to Saouma. ☐

World Food News is prepared by the North American Liaison Office of the Food and Agriculture Organization of the United Nations.

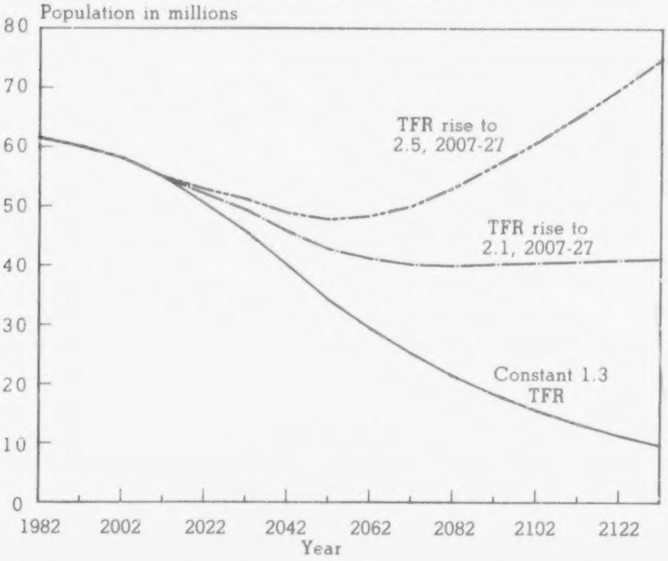
## Ronald Lee Elected PAA President

Ronald D. Lee of the University of California at Berkeley has been elected President Elect of the Population Association of America. In keeping with PAA election policy, Lee will serve as President Elect of the organization in 1986 and succeed Paul Demeny of the Population Council as President in 1987.

In other results of the PAA elections, for which 1,041 ballots were cast by mail this summer, Wendy Baldwin was elected First Vice President, and John Knodel Second Vice President. ☐

## SPEAKING GRAPHICALLY

### The Population Future of West Germany: Three Possibilities



This month's graph gives three possible futures for West Germany, which has the world's lowest fertility: a total fertility rate (TFR) of 1.3 births per woman reported in 1983. If that low TFR were to remain constant, West Germany's population would enter a period of protracted decline, reaching a population of just under 10 million by 2132. If the country's fertility trend reversed itself, perhaps in response to concern over population loss, and the TFR rose to the "replacement level" of 2.1 children during the period 2007-2027 (as an example), the middle line shows that population decrease would eventually level off at about 40 million, a one-third decrease from the 61 million of 1985. The top line simply illustrates that population decrease can only be turned around by a rise in fertility above the replacement level, in this case a rise to a TFR of 2.5 by 2007-2027.

*Source.* PRB projections based on West German data.

## Soviet Mortality: Another View

The apparent contradiction of rising mortality in an industrialized nation has made the USSR a subject of a number of articles in recent years. R.H. Dinkel of the University of Munich, writing in the March 1985 issue of *Population Studies*, theorizes that the recent downturn in Soviet life expectancy may be in part due to the high number of deaths of healthy young men during World War II.

Though some theorists have asserted that the decline in Soviet life expectancy is a result of the high incidence of alcoholism there, Dinkel argues that this cannot explain so major a change in national life expectancies and also points out that the much-maligned Soviet health delivery system, while inefficient in many areas, has done much to improve conditions in a country which was largely undeveloped and should be at least able to maintain what life expectancy levels were achieved.

He further poses the possibility that, in the immediate postwar period, higher death rates for the cohorts who suffered heavy mortality during the war (as much as 60 percent in some instances) did not become evident until the survivors of those cohorts, the "bad risk" members of the group, had reached the older ages. Now that they have, their higher death rates for males manifest themselves in an apparent decrease in period life expectancy, an effect that should diminish by the end of the 1980s and early 1990s as these affected cohorts die off.

Indirect evidence of this phenomenon is provided by Dinkel by comparing death rates for Germany, a country also affected by heavy war mortality and Sweden, which was not, with the USSR's death rates at the older ages. Both the USSR and West Germany show more excess male mortality in the age cohorts depleted by war than does Sweden. ☐

# DEMOGRAPHER'S

## The Top Ten

by Cary Davis

Not for the first time a recent call to PRB's library prompted me to look at relatively familiar numbers from a new slant. The question was deceptively simple: "What countries have experienced the most population growth from World War II to the present?" Like many questions we receive, this one had a decidedly practical air about it – practical enough that I was a little surprised that the requested list did not come immediately to mind. At least part of the reason for this, as with so many questions received in the past, was that a few interesting wrinkles would have to be resolved before an answer could be produced.

Since the caller was a reporter putting together a population piece (certainly grist for PRB's mill), I took off with a vengeance. Not having talked with the individual myself, I wasn't clear what measure should be used. If the questioner were interested in each nation's impact on the global population situation then those countries with the largest absolute gains were required. It was equally plausible, however, that the reporter's interest lay in knowing which countries, regardless of absolute population size, had experienced the most rapid *rate* of growth.

Interesting in itself, the answer to this question would naturally lead to others, such as the common characteristics of the fastest growing countries, what factors accounted for the rapid pace of population increase, and how were the countries coping?

In this latter case, where the rate of growth is the criterion, absolute numbers are necessarily washed out of the computations. This is fine except that some recognized national entities have smaller populations than, say, Greeley, Colorado, and are of about the same international importance. For this reason they probably should not be considered in the same league with, say, Indonesia (a country with a greater population than all of Western Europe combined). The importance of absolute numbers thus creeps back in, suggesting a third possibility: a list based on rate of growth but which requires a certain population threshold.

### Ready for Any Eventuality

Not being able to clarify the questioner's real interest – the caller had left no number but was to phone back at the end of the day (almost assuredly 11 minutes before the piece's publication deadline) – I decided to take the "reasonable" course of action and compile not one but three lists. The first would include the 10 countries which accounted for the largest gain in world population. List #2 would show the 10 with the highest growth rates of the 150 or so most populous countries in the world. The last list would also show countries ranked by growth rate, but would be limited to those with a current population of at least 10 million.

Having charted a course, my next thought was about resources. What kind of data is one likely to come up with for "all countries" over a 40-year span? At first glance this would seem to focus attention on questions of data quality and reliability. Such considerations take a back seat, however, to the larger question of the malleability of nations. There are no recorded data for Bangladesh in 1940 because there was no Bangladesh in 1940. In fact, in 1940 there wasn't even a Pakistan. Most of the nations of Africa didn't come into being until about halfway through the desired interval. Borders worldwide are being altered at an embarrassingly high rate.

I took a strong stand on this one. If you've got a basically good question, you can't let piddling details get in your way. Having determined that I wasn't going to be deterred in my measurement of a country's population growth by the fact that the country happened not to exist at one of the reference points, it was child's play to grapple with quality of data questions. I used whatever I had. A set of estimates for 1940 provided a convenient starting point.

**Table 1: Top Ten Countries in Order of Absolute Population Gain, 1940-1985**

| | Population 1940 | Population 1985 | Absolute Change |
|---|---|---|---|
| | (in millions) | | |
| China | 530 | 1042 | 512 |
| India | 316 | 762 | 446 |
| USA | 133 | 239 | 106 |
| Indonesia | 70 | 168 | 98 |
| Brazil | 41 | 138 | 97 |
| USSR | 195 | 278 | 83 |
| Pakistan | 31 | 99 | 68 |
| Nigeria | 24 | 91 | 67 |
| Bangladesh | 39 | 102 | 63 |
| Mexico | 20 | 80 | 60 |

### What the Tables Showed

All three tables proved interesting, with each shedding light on different topics. In Table 1 (above), for instance, where the top 10 countries are ranked by absolute gains, it comes as no surprise that China and India head the list. It is more impressive that they contributed half again as much growth as the next eight nations combined. Altogether Asia, home to almost 60 percent of the world's population, captured five of the top 10 slots.

The U.S., with a solid lock on third place, and the USSR are the only developed nations on the list. The Soviet Union also presents the first case on the list of a country with a lower ranking in population gain (sixth) than in absolute size in 1985 (third). That the U.S. added far more than the USSR was due to its

**Cary Davis is Executive Director of PRB's Demographic Information Service Center (DISC).**

baby boom and consistently high immigration, while the USSR's World War II losses have had demographic consequences down to the present day (see article on page 5).

It is interesting that many of the population giants of 1940 (Japan, Great Britain, Germany, France, Italy) are not on the list. Despite large base populations, their growth has been slow in the intervening years.

Table 2 (below) appeals to me because it identifies those countries that have had to cope with the most extreme ramifications of rapid population growth. Due to their generally small absolute size they have often attracted less attention than their larger neighbors. They have all, however, experienced over 3 percent annual average growth during the last 45 years. The influence of immigration, which can easily outweigh natural increase as the dominant force behind rapid population growth for small countries, is much in evidence in this list and explains otherwise unachievable rates of growth.

The data in this table must be approached cautiously. Because it ranks nations on growth rate regardless of absolute size, population growth rates can be grossly distorted by relatively minor errors in population estimates, especially for small countries.

### Table 2: Top Ten Countries in Order of Growth Rate, 1940-1985

| | Population 1940 (millions) | Population 1985 (millions) | Growth Rate (%) | Absolute Change (millions) |
|---|---|---|---|---|
| Kuwait | 0.1 | 1.9 | 6.5 | 1.8 |
| United Arab Em. | 0.1 | 1.3 | 5.7 | 1.2 |
| Libya | 0.8 | 4.0 | 3.6 | 3.2 |
| Venezuela | 3.7 | 17.3 | 3.4 | 13.6 |
| Costa Rica | 0.6 | 2.6 | 3.3 | 2.0 |
| Kenya | 4.8 | 20.2 | 3.2 | 15.4 |
| Ivory Coast | 2.5 | 10.1 | 3.1 | 7.6 |
| Mexico | 19.8 | 79.7 | 3.1 | 59.9 |
| Honduras | 1.1 | 4.4 | 3.1 | 3.3 |
| Syria | 2.7 | 10.6 | 3.0 | 7.9 |

With this caveat in mind it is interesting to note that the top four countries in annual rates of growth are all oil exporters. The rates for Kuwait and the United Arab Emirates in particular would be unattainable without immigration.

The Asian countries, so evident in the previous list, are noticeably absent here, as are, predictably, the non-oil-based developed nations.

As a final note, it is interesting that Mexico and Costa Rica, recognized for their recent success in reducing fertility, had enough growth over the full 45-year span to remain on the list. In contrast, some countries with very rapid growth today (Uganda, Guatemala, Jordan) did not make the list. The really rapid growth in these countries has begun relatively recently and their momentum for growth is still high. No doubt, if such a list were made 10 years from now, these countries would supplant those whose growth has already slowed.

The third and last table (right) also ranks countries by growth rate but restricts entries to those with a current population greater than 10 million. The top three countries (Venezuela, Kenya, and Mexico) are carried over from Table 2, sharing the characteristics of rapid population growth and substantial base populations. Mexico is a standout as the only country included on all three tables.

The geographic mix of this list is notable: Asia, Africa, and Latin America each have at least three countries represented. Again, strikingly absent are countries from the developed world. Using this definition, if rapid growth is a problem, then it is a problem predominantly for the developing world and one that is widely distributed within that arena.

Although the two Third World giants are missing from this list, we see that rapid growth occurs in countries of widely varying sizes. Iraq and Venezuela are close to the minimum population threshold required for this table while four of the 10 countries on this list are among the top 10 in absolute gain. The list contains countries with oil-based economies and countries with almost no oil. It identifies countries that have nearly reached developed status and countries that have just begun to develop. Maybe most importantly it identifies nations that need and warrant continued assistance as they attempt to deal with the problems produced by rapid population growth.

### Table 3: Top Ten Countries With 1985 Populations Greater than 10 Million, in Order of Growth Rate, 1940-1985

| | Population 1940 (millions) | Population 1985 (millions) | Growth Rate (%) | Absolute Change (millions) |
|---|---|---|---|---|
| Venezuela | 4 | 17 | 3.4 | 13 |
| Kenya | 5 | 20 | 3.2 | 15 |
| Mexico | 20 | 80 | 3.1 | 60 |
| Iraq | 4 | 16 | 3.0 | 12 |
| Nigeria | 24 | 91 | 3.0 | 67 |
| Sudan | 6 | 22 | 2.8 | 16 |
| Thailand | 15 | 53 | 2.8 | 38 |
| Philippines | 17 | 57 | 2.8 | 40 |
| Brazil | 41 | 138 | 2.7 | 97 |
| Pakistan | 31 | 99 | 2.6 | 68 |

I have put this information together in part to share with you my continuing fascination with the shifting perspectives on population data that users' questions can generate. Even this straightforward inquiry changed my view on some rather commonplace data. There is, however, another reason for my writing this Demographer's Page: After I became absorbed in the topic, no one bothered to call back for an answer. And I hate to let good information go to waste. ☐

## Asian Americans

*Continued from page 2*

population, live in metropolitan areas, chiefly Honolulu, San Francisco, Los Angeles, and New York City. The fertility of all but Vietnamese among the six major groups is lower than the U.S. white average, and limited evidence shows that Japanese, Chinese, and Filipinos, at least, score as well or better than white Americans on life expectancy and infant mortality.

### High Achievers

Except for Vietnamese and some others of the latest arrivals, Asian Americans also rank as high or higher than white Americans on the socioeconomic ladder. Some evidence cited by Gardner, Robey, and Smith:

- In 1980 in all six major groups except Vietnamese, the proportion of men aged 25-29 who had completed high school surpassed the white figure of 87 percent, and the figure for Vietnamese men this age (76 percent) exceeded the figures for black men (74 percent) and Hispanic men (58 percent). The proportion of college graduates among men and women over 25 in all six Asian groups, including Vietnamese, was 35 percent, compared to just 17 percent for white adults.
- According to the 1980 Census, almost all Asian American men and women are more likely than white adults to be in the labor force and less likely to be unemployed.
- From 26 to 47 percent of Filipino, Japanese, Chinese, and Asian Indian immigrants in the labor force held jobs in the top occupational category of "managers, professionals, and executives" in 1980, compared to 24 percent of white working men and women. Among the foreign-born in the major Asian groups, this figure was lower than that of whites only for Koreans (22 percent) — many of whom operate their own businesses, notably independent grocery stores in Los Angeles and New York — and for Vietnamese (13 percent).

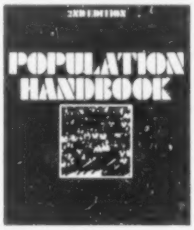
The 1980 Census recorded the previous year's median per-worker income as higher than the white median only for Japanese, Chinese, and Asian Indians. But the median *family* income for white Americans ($20,800) was topped by the family median for the six major Asian groups as a whole ($23,600) and by each of the groups except Vietnamese ($12,840). Part of the explanation, the *Bulletin* authors point out, is that except for the Japanese, upwards of two-thirds of all Asian Americans counted in 1980 were foreign-born and "recent Asian immigrants are making the economic adjustment to life in the U.S. by depending on family support" — living together in extended family households that produce more workers per family.

Still lagging on all the socioeconomic scores are "second-wave" Indochinese refugees arriving since 1978. Compared with the first wave of Indochinese, who were evacuated to the U.S. after the fall of Saigon in April 1975, the Indochinese of the second-wave (most of them poverty-stricken "boat people") came far less equipped to deal with life in America. But a 1982 survey shows second-wave refugees catching up, the authors report: After four years in the U.S., the proportion of these families on welfare was down to 50 percent; adult unemployment and family poverty levels dropped to 30 percent; and two-thirds of adults had received English-language instruction.

The authors observe that the U.S. has "never until perhaps now admitted a nonwhite group to full parity with the white majority." But they predict that Asian Americans are likely to assimilate rapidly, with their tradition of strong family support and dedication to education and hard work, as intermarriage proceeds, and as more of them are native-born Americans. ☐

Copies of the 43-page *Population Bulletin*, "Asian Americans: Growth, Change, and Diversity" (Vol. 40, No. 4) can be ordered for $4.00 each; 2-10 copies, $3.00 each; 11-50 copies, $2.50 each; over 50, $2.00 each. Handling charges: inside the U.S., add $1.00 to each order; outside the U.S., add 25 percent of cost of the *Bulletins* ordered. Send order and remittance to PRB, Circulation Dept., P.O. Box 35012, Washington, D.C. 20013.

## Handbook Rides Again In New, Revised Edition



PRB's perennially popular *Population Handbook* has just been published in a new, revised, and enlarged Second Edition.

Now 72 pages long, the new Handbook contains specially prepared sections on calculating total fertility rates and understanding the life table. In addition to these new sections, the Handbook retains the detailed definitions of population rates and statistics that have made it the demographic guide for the perplexed.

For example, the Handbook defines the general fertility rate as "the number of live births per 1,000 women aged 15-44 years in a given year." It then gives the formula for calculating the rate, explains certain advantages this rate has over the crude birth rate, and shows how to calculate the 1983 general fertility rate for the U.S., given the number of births in that year. (The Handbook's statistics have been updated to reflect the latest available data.)

Also included are a guide to U.S. government demographic statistics and a guide to references and institutions for further data.

Originally published in 1978, the first edition of the Handbook, written by PRB staffers Arthur Haupt and Thomas T. Kane, went through four printings and has been widely used by students, journalists, and businesspeople around the world. It has also spawned a wide variety of special Handbook editions — an International edition and a Caribbean edition (both in English); and French-, Spanish-, Thai- and Arabic-language editions, all of which remain available from PRB.

Prices of the Handbook are $5.00 for single copies; $4.50 each for 2-49 copies; $4.00 each for 50-99 copies; prices on request for 100 or more copies. Send order and remittance to PRB, Circulation Dept., P.O. Box 35012, Washington, D.C. 20013. (Enclose $1.00 for postage and handling; orders under $20.00 must be prepaid.)

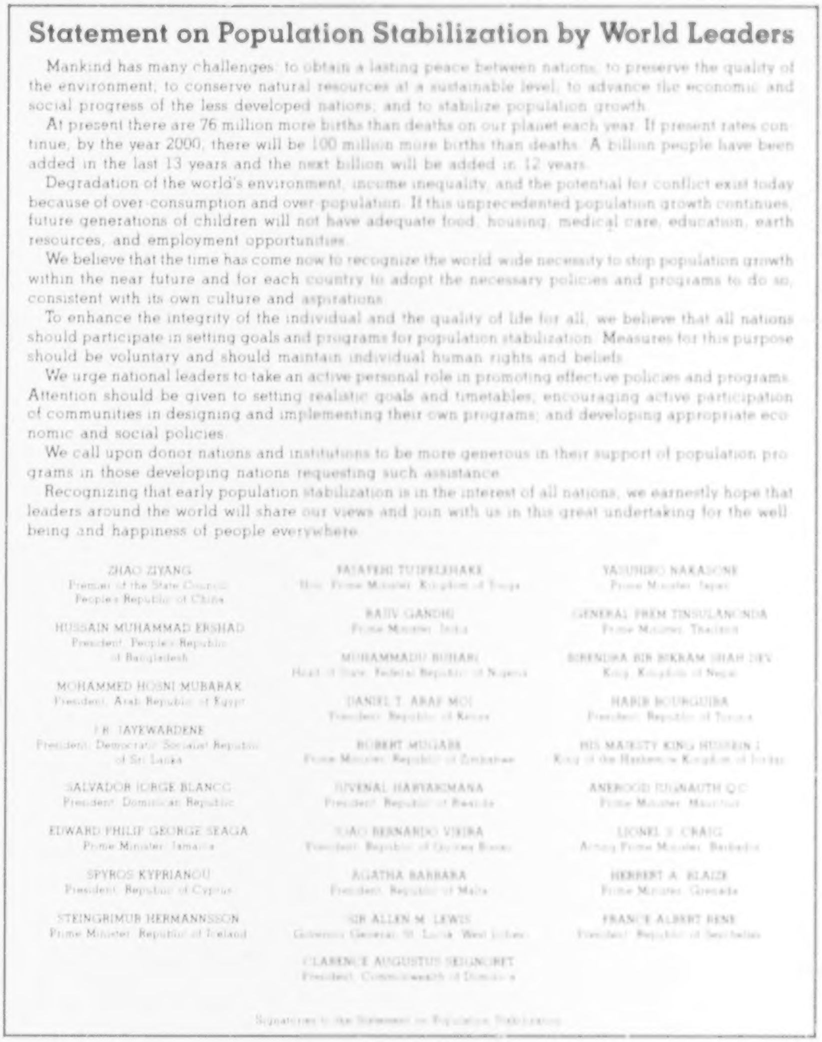
# 'Stop Population Growth,' World Leaders Urge

Thirty heads of state, including those of China, India, Japan, Nigeria, and Thailand, have now signed a *Statement on Population Stabilization by World Leaders* which asserts that population growth is a principal barrier to the progress of the less developed countries.

"If this unprecedented population growth continues," states the document signed by the leaders, "future generations of children will not have adequate food, housing, medical care, education, earth resources, and employment opportunities . . . To enhance the integrity of the individual and the quality of life for all, we believe that all nations should participate in setting goals and programs for population stabilization."

The statement represents the first explicit recognition by heads of state that population growth can hinder development. Its advocates see it as "a step beyond" the consensus on the interrelation of population and development reached in world population conferences.

The document, pictured at right, will be presented by India's Rajiv Gandhi to UN Secretary General Javier Perez de Cuellar in the General Assembly during the 40th anniversary celebration of the founding of the United Nations. ☐



## Statement on Population Stabilization by World Leaders

Mankind has many challenges: to obtain a lasting peace between nations; to preserve the quality of the environment; to conserve natural resources at a sustainable level; to advance the economic and social progress of the less developed nations; and to stabilize population growth.

At present there are 76 million more births than deaths on our planet each year. If present rates continue, by the year 2000, there will be 100 million more births than deaths. A billion people have been added in the last 13 years and the next billion will be added in 12 years.

Degradation of the world's environment, income inequality, and the potential for conflict exist today because of over-consumption and over-population. If this unprecedented population growth continues, future generations of children will not have adequate food, housing, medical care, education, earth resources, and employment opportunities.

We believe that the time has come now to recognize the world wide necessity to stop population growth within the near future and for each country to adopt the necessary policies and programs to do so, consistent with its own culture and aspirations.

To enhance the integrity of the individual and the quality of life for all, we believe that all nations should participate in setting goals and programs for population stabilization. Measures for this purpose should be voluntary and should maintain individual human rights and beliefs.

We urge national leaders to take an active personal role in promoting effective policies and programs. Attention should be given to setting realistic goals and timetables; encouraging active participation of communities in designing and implementing their own programs; and developing appropriate economic and social policies.

We call upon donor nations and institutions to be more generous in their support of population programs in those developing nations requesting such assistance.

Recognizing that early population stabilization is in the interest of all nations, we earnestly hope that leaders around the world will share our views and join with us in this great undertaking for the well-being and happiness of people everywhere.

ZHAO ZIYANG
Premier of the State Council
People's Republic of China

HUSSAIN MUHAMMAD ERSHAD
President, People's Republic
of Bangladesh

MOHAMMED HOSNI MUBARAK
President, Arab Republic of Egypt

J.R. JAYEWARDENE
President, Democratic Socialist Republic
of Sri Lanka

SALVADOR JORGE BLANCO
President, Dominican Republic

EDWARD PHILIP GEORGE SEAGA
Prime Minister, Jamaica

SPYROS KYPRIANOU
President, Republic of Cyprus

STEINGRIMUR HERMANNSSON
Prime Minister, Republic of Iceland

FATAFEHI TU'IPELEHAKE
Hon. Prime Minister, Kingdom of Tonga

RAJIV GANDHI
Prime Minister, India

MUHAMMADU BUHARI
Head of State, Federal Republic of Nigeria

DANIEL T. ARAP MOI
President, Republic of Kenya

ROBERT MUGABE
Prime Minister, Republic of Zimbabwe

JUVENAL HABYARIMANA
President, Republic of Rwanda

JOAO BERNARDO VIEIRA
President, Republic of Guinea Bissau

AGATHA BARBARA
President, Republic of Malta

SIR ALLEN M. LEWIS
Governor General, St. Lucia, West Indies

CLARENCE AUGUSTUS SEIGNORET
President, Commonwealth of Dominica

YASUHIRO NAKASONE
Prime Minister, Japan

GENERAL PREM TINSULANONDA
Prime Minister, Thailand

BIRENDRA BIR BIKRAM SHAH DEV
King, Kingdom of Nepal

HABIB BOURGUIBA
President, Republic of Tunisia

HIS MAJESTY KING HUSSEIN I
King of the Hashemite Kingdom of Jordan

ANEROOD JUGNAUTH Q.C.
Prime Minister, Mauritius

LIONEL E. CRAIG
Acting Prime Minister, Barbados

HERBERT A. BLAIZE
Prime Minister, Grenada

FRANCE ALBERT RENE
President, Republic of Seychelles

Signatories to the Statement on Population Stabilization

# Population Update

Estimated United States Population:

| | |
|---|---|
| As of June 1, 1985 | 238,616,000 |
| As of June 1, 1984 | 236,502,000 |

**The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 973.**

Estimated World Population:

| | |
|---|---|
| As of October 1985 | 4,866,000,000 |
| Annual Growth | 82,000,000 |

**Estimated by extrapolation of the mid-1985 world population given on the 1985 World Population Data Sheet.**

**Latest Provisional Statistics for the U.S.: June 1985**

| Item | 12 months ending with June | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,742,000 | 3,631,000 | 15.8 | 15.5 | 15.9 | 15.9 |
| Deaths | 2,078,000 | 2,031,000 | 8.8 | 8.6 | 8.6 | 8.5 |
| Natural increase | 1,664,000 | 1,600,000 | 7.0 | 6.9 | 7.3 | 7.4 |
| Marriages | 2,447,000 | 2,454,000 | 10.3 | 10.4 | 10.6 | 10.6 |
| Divorces | 1,160,000 | 1,161,000 | 4.9 | 4.9 | 5.1 | 5.2 |
| Infant deaths | 39,300 | 39,200 | 10.5 | 10.8 | 11.0 | 11.4 |
| Population base (in millions) | ... | ... | 237.3 | 234.9 | 232.7 | 230.5 |

***Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.**

***Source. Monthly Vital Statistics Report* (Vol. 34, No. 6) from the National Center for Health Statistics.**

## SOFTWHERE

*PT* readers wishing to share population related software, spreadsheet applications, or other personal-computer solutions can list them in *PT*, which will print problems and solutions gratis on a space-available basis, without endorsing the claims therein. Write to: "Softwhere," *Population Today*, 2213 M St., N.W., Washington, D.C. 20037.

**FuturePop** is a cohort-component population projection program, available for the IBM-type personal computer, which provides annual demographic parameters and "pyramid" distributions for single and five-year age groups, along with deaths, births, and/or migrants for any or all years in the projection cycle. The user inputs sex ratio at birth, age-sex specific mortality, fertility, net migration, and population by age.

Requirements: 256K, 2 double-sided drives or one drive and a hard disk, DOS 2.0+, and a text editor which produces standard ASCII files.

FuturePop may be copied and distributed without charge for noncommercial use. To obtain program diskette with example programs and 40 page manual, send $5.00 (checks payable to FuturePop Software) to: FuturePop, c/o Ralph R. Sell, Dept. of Sociology, 106 Morey Hall, University of Rochester, Rochester, N.Y. 14627.

## POSITIONS/ PROFESSIONALS

The Rockefeller Foundation continues its **Social Science Research Fellowship** programs this year in two fields: agriculture and population studies. Applications will be accepted through Jan. 31, 1986 for two-year fellowships in developing countries to be taken up in mid- or late 1986.

Applicants must demonstrate interdisciplinary adaptability and interest in the agricultural or population aspects of international development work. The PhD must have been received after December 1981 or be expected before September 1986. Interested parties should contact the Fellowship Office, Rockefeller Foundation, 1133 Avenue of the Americas, New York, N.Y. 10036.

## TAKE A NUMBER . . .

**Update on U.S. Hispanic Fertility:** The National Center for Health Statistics has released its annual report on Hispanic birth rates in the U.S. The 1982 figures in this report indicate that, overall, there was a slight decrease in Hispanic fertility from 1981 while that of non-Hispanics remained constant. These data, collected in a total of 23 states in 1982, account for about 95 percent of all Hispanic births nationwide. Within the Hispanic population, a large diversity in fertility was noted with 102 births per 1,000 women aged 15-44 reported for Mexican Americans while the rate for Cuban women was 54. The problem of actually defining when a birth is Hispanic and when it is not is also illustrated by the report: 21 percent of the births to Hispanic women were reported to have either non-Hispanic fathers or fathers whose ethnic group was unknown. In 1982, Hispanics accounted for about 6.7 percent of the U.S. total population and about 9.6 percent of annual births.

**Maternal Mortality Rates Compiled:** The World Health Organization (WHO) has issued a collection of maternal mortality tabulations which will be incorporated into a future WHO monograph on the subject. Worldwide, WHO estimates that at least 500,000 women die as a result of pregnancy each year, although it is also true that in areas where the problem is most severe, maternal deaths are not likely to be registered. The highest national rate shown in the table is an estimate for Bangladesh in 1981-1983 of 3,000 maternal deaths per 100,000 live births (the U.S. rate was 8 in 1982).

**Here and There**. . . the median age at marriage in the U.S. has almost returned to Victorian-era standards, 25.4 years of age for men and 23.0 for women as of 1984; the age difference, 2.4 years, is identical to that of 1956 when the median ages were the lowest, 22.5 and 20.1, respectively. . . the West German crude birth rate is down *again* in 1984, to 9.5 births per 1,000 population from 1983's 9.7. . . the Census Bureau has published a revised series of U.S. population estimates with components of change which are consistent with both the 1970 and 1980 Census counts; monthly estimates are also given for total population back to 1950; these can be found in *Current Population Reports*, Series P-25, No. 971.

### . . . addenda

**Signs of the Inexorable Aging of America — II**

BRAN
A cereal high in natural wheat fiber.
No cereal has more natural fiber.

Breakfast cereals, once a sugar paradise for American children, are now promoted for their alleged ability to prevent cancer of the colon.

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 2213 M St., N.W., Washington, D.C. 20037.*

**THE AMERICAN PEOPLE, by Bryant Robey. New York: Dutton. 1985. 289 pages. $22.50. ISBN 0-525-24296-1.**

Bryant Robey, founding editor of *American Demographics* magazine, has created a demographic portrait of Americans that goes a long way toward dispelling the view that writing about census and survey data needs to be dull and complicated. *The American People* gleans information from these sources, particularly the 1980 Census, to tell us who we are, where and how we live, and what we do. It tracks the economic, social and demographic implications of such major demographic trends as the baby boom and bust, increased immigration, and the dramatic rise in labor force participation by women.

The combined trends toward smaller, two-earner families among upwardly mobile married couples and increasing single-parent families headed by women are shrinking the traditional middle class. At the same time, immigration is reshaping the ethnic mosaic of the nation, with Hispanics and Asians filling the melting pot once comprised of Italians, Irish, Germans, and Scandinavians. For business, these shifts have spelled the end of the mass market; success today requires mastering the demographics of market segmentation. *The American People* is a clear, well written rendition of this story. Readers in business and government as well as educators will find it interesting on first reading and useful as a later reference source.

*—Thomas W. Merrick*

**CLAMOR AT THE GATES: The New American Immigration, edited by Nathan Glazer. San Francisco: Institute for Contemporary Studies. 1985. 337 pages. $10.95 paper. ISBN 0-917616-69-3**

These 12 original essays constitute the best such collection of research on immigration and ethnicity to be published in recent years.

The book's theme reaches past simple immigration issues to the broader questions of ethnicity and what is an American. In his own essay, Glazer goes well "beyond the melting pot" as he addresses the educational problem the nation is facing. He concludes: "In a society where all aspire to equal participation, all must undergo education in the same modes: the language in use in the society, literacy suitable for fulfilling jobs in that society, the methods of calculation that have universal validity, the science that is everywhere the same."

One of the best essays is that by Peter H. Schuck, professor of law at Yale University. Schuck brilliantly explains how immigration law serves to answer the basic societal questions: "What are we?" "What do we wish to become?" and especially, "What individuals constitute the 'we' who shall decide these questions?" He then proceeds to describe the shift in legal interpretation from individual to community interests.

Four major themes are covered by the 12 articles: Making an Immigration Policy, Immigrants and the Economy, Becoming American, and Portents of the Future.

As Glazer notes in his introduction, "The U.S., it seems, remains the permanently unfinished country." While immigration and refugee policy issues are excellently covered by Fuchs, Briggs, Teitelbaum, and others, the overall theme is broader, addressing the perplexing questions, what is an American, now and in the 21st century?

*—Leon F. Bouvier*

**INNOVATION AND ENTREPRENEURSHIP, by Peter Drucker. New York: LHarper and Row. 1985. 277 pages. $19.18 [sic]. ISBN 0-06-015428-4.**

Drucker, business consultant supreme, sees the last two decades fostering a major resurgence in entrepreneurship in the U.S., and much of this book is concerned with examining case-by-case lessons of successful entrepreneuring. The book's first section, however, is concerned with recent phenomena of change and innovation, and one of these is the stimulus of population change.

"Demographic shifts in this century may be inherently unpredictable, yet they do have long lead times before impact, and lead times, moreover, which are predictable" (e.g., the effect of the 1960s baby bust on the 1980s), writes Drucker. And the rewards are great for entrepreneurs who understand that populations are in a state of continuing change, and who, rather than relying on the wisdom of the past, go out in the field to figure what the consequences of those changes will be.

*—Arthur Haupt*

# PUBLICATIONS RECEIVED

**DICTIONARY OF RACE AND ETHNIC RELATIONS.** by E. Ellis Cashmore. Boston: Routledge & Kegan Paul, 1984. 294 pages. $34.95

**DIVORCE AND SEPARATION: Context, Causes, and Consequences.** edited by George Levinger et al. New York: Basic Books, 1979. 363 pages.

**ETHNICITY AND RACE IN THE USA: Toward the Twenty-First Century.** edited by Richard D. Alba, 1985. 186 pages. $24.95.

**THE FAMILY: Politics and Social Theory.** by D. H. J. Morgan. Boston: Routledge & Kegan Paul, 1985. $32.50. 320 pages.

**HISPANICS IN THE U.S. ECONOMY.** edited by George J. Borjas et al. New York: Academic Press, 1985. 375 pages. $29.50.

**LOCAL COMMUNITY FACT BOOK, CHICAGO METROPOLITAN AREA: Based on the 1979 and 1980 Censuses.** edited by the Chicago Fact Book Consortium. Chicago: University of Illinois, 1984. 468 pages. $17.50.

**PARENTING IN CONTEMPORARY SOCIETY.** by Tommie J. Hamner et al. Englewood Cliffs, N.J.: Prentice-Hall, 1985. 370 pages. $20.95.

**THE POLITICS OF SEX AND RELIGION: A Case History in the Development of Doctrine, 1962-1984.** by Robert Blair Kaiser. Kansas City, Mo.: Leaven Press, 1985. 263 pages. $10.95.

**PRICING THE PRICELESS CHILD: The Changing Social Value of Children.** by Viviana A. Zelizer. New York: Basic Books, 1985. 275 pages. $18.95.

**PROFILES IN POPULATION: A Comparative Review of the Principal Donor Agencies.** by Margaret Wolfson. Paris: Development Centre of the Organization for Economic Cooperation and Development, 1983. 183 pages. Available from OECD, Washington, D.C. $16.00.

**SEX ROLES IN THE NIGERIAN TIV FARM HOUSEHOLD.** by Mary E. Burfisher et al. West Hartford, Conn.: Kumarian Press, 1985. 62 pages. $7.95.

**UNCLE SAM'S FAMILY: Issues in and Perspectives on American Demographic History.** by Robert V. Wells. Albany, N.Y.: State University of New York Press, 1985. 184 pages. $8.95.

**WITHOUT JUSTICE FOR ALL: The Constitutional Rights of Aliens.** by Elizabeth Hull. Westport, Conn.: Greenwood Press, 1985. 244 pages. $29.95.

**YOU'RE A BETTER PARENT THAN YOU THINK! A Guide to Common-Sense Parenting.** by Raymond N. Guarendi. Englewood Cliffs, N.J.: Prentice-Hall, 1985. 241 pages. $7.95.

# SPOTLIGHT

## MALI

Population (1985 est.): 7.7 million
Crude Birth Rate: 49 births per 1,000 pop.
Crude Death Rate: 21 deaths per 1,000 pop.
Rate of Natural Increase: 2.8 percent
Infant Mortality Rate: 137 infant deaths per 1,000 live births
Total Fertility Rate: 6.7 lifetime births per woman
Life Expectancy at Birth: 42 years
GNP per Capita: US $150
Percent of Population under 15: 46
Percent of Population over 64: 3
Capital: Bamako

**by Ousmane Sokona**

The Republic of Mali, a large, landlocked country in sub-Saharan Africa, occupies 479,000 square miles in the western part of that continent. Like those countries which border on it (all former French colonies: Mauritania, Guinea, Senegal, Ivory Coast, Burkina Faso, Niger, and Algeria), Mali is predominantly rural—only 18 percent of Mali's citizens live in urban areas—and its fertility is high. Though at 2.8 percent Mali's population growth rate is relatively rapid, government officials do not consider population growth an immediate problem, because its population density is still quite low (16 persons per sq. mile).

The country's leaders see its economic status as a more urgent problem. The people of Mali are among the poorest in the world, due to a combination of political and natural crises which have plagued the nation since 1960. Soon after its independence from France that year, the country transformed itself into a planned, socialist economy, nationalizing some private companies in the process. During the final two of the eight years of socialist government, France imposed a 50 percent devaluation of the Malian franc, and the National Assembly dissolved.

These crises led to a military coup d'etat in 1968, which suspended the country's first constitution. Government rule was returned to the civilians in 1979 when a new constitution, adopted in 1974, came into full effect. Moussa Traoré was elected President, and a single political party, the Democratic Union of the Malian People, was founded.

Traditionally self-sufficient in grains (millet, rice, sorghum), the country was forced to import food after the Sahelian drought of 1973. The availability of food per capita has declined ever since. Agriculture represents about 16 percent of Mali's Gross National Product, while approximately 80 percent of the working population of this rural country is engaged in farming. However, only 2 percent of the land is cultivated. Cropland is limited to the southern half of the country, where rainfall is sufficient, irrigation is possible, or river flooding occurs. Small-scale, traditional farming dominates: subsistence farms account for about 90 percent of the cultivated land. Cyclical climatic conditions will most likely dictate Mali's agricultural well-being until water resources can be managed and exploited.

Since independence, Mali has built some light industries with the help of various aid donors. However, industrialization has not advanced very far. Manufacturing consists principally of processed agricultural products.

World Bank photo by Yosef H[illegible]

Yarn dyer in Segu, Mali

Ninety-nine percent of Malians are native African, including tribes of both Berber and Negro descent; 90 percent are Muslim, 9 percent animist and 1 percent Christian.

Mali's government has not placed population control high on its list of priorities. Both fertility and mortality are high (though mortality is declining), the rate of natural increase is rising, and though life expectancy at birth is increasing, this growth is very slow. Between 1970 and 1985, Malians gained only about 5 years in longevity.

Rather than emphasizing reduced population growth, the government's primary concerns are the nation's high rates of morbidity, mortality, emigration, and, to a lesser extent, rural-urban migration. Although Mali was the first francophone West African country to repeal (in 1972) the 1920 French law which prohibited the advertising, sale, and distribution of contraceptives, family planning there is essentially pronatalist. Contraceptives, which are viewed as a means of freeing young girls from abstinence, are still seen as a threat to marriage.

The major goal of family planning in Mali is the improvement of maternal and child health (MCH). Fertility reduction is thus simply a by-product of the MCH program. This policy, common to several other developing countries, makes contraceptives more acceptable to low-literacy populations with strong pronatalist views. ☐

Ousmane Sokona, who served as demographic consultant at PRB, is now a statistician in the Census Bureau of Mali.

12/10/85

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# POPULATION TODAY

Vol. 13, No. 11 November 1985

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The demographics behind the controversy

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Changing U.S. age structure plagues policymakers

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Honored by PRB for contributions to field

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Position is highest U.S. population post

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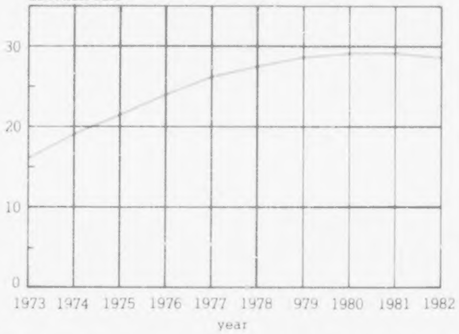
### We're Moving

PRB is pleased to announce that as of Dec. 9, 1985, it will move downtown to new, larger quarters:

Population Reference Bureau, Inc.
777 14th St. N.W., 8th Floor
Washington, D.C. 20005
Phone 202-639-8040

**Abortions per 1000 U.S. women aged 15-44**

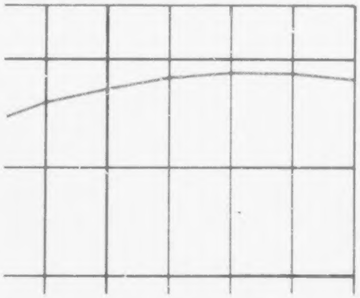


The U.S. abortion rate has leveled off. See page 2.

A Publication of the Population Reference Bureau, Inc. ISSN 0749-2448

# Abortion in America: 12 Years After *Roe v. Wade*

Among demographic indicators, few spark the national and international concern of abortion. The abortion debate in the U.S. has transcended the realm of medicine and pervaded the public consciousness. It has even entered national politics: a candidate's stance on abortion is viewed by many activists on both sides of the issue as one of the most important barometers of his or her political desirability.



Anti-abortion activists have never been more vocal and visible than in the past five years. Indeed, some prolife activists, apparently spurred by the strength of their conviction that abortion is murder, have resorted to violence. The National Abortion Federation reports that in 1984 there were 24 incidents of arson and bombing of abortion facilities in seven states and the District of Columbia. These activities are deplored by the mainline prolife organizations.

Under the Reagan Administration, anti-abortion activists have gained increased influence. The President has embraced right-to-life leaders, and is said to listen carefully to his prolife constituents. With President Reagan's approval, the Justice Dept. has asked the Supreme Court to overturn its landmark 1973 *Roe v. Wade* decision.

With that decision, the Supreme Court established that a woman's right to privacy entitles her to a safe, legal abortion, but that this right is not unqualified. It ruled, therefore, that decisions about abortion in the first trimester of pregnancy be left to the woman and her physician and not be regulated by the state. Second-trimester abortions, the Court ruled, could be regulated by the state "in ways that are reasonably related to maternal health" (i.e., restricted to hospitals, though this restriction was eased in the 1983 Supreme Court decision which affirmed *Roe v. Wade*). The Court allowed states to regulate, and even proscribe, abortions performed in the "stage subsequent to viability." (This raises questions about technology's effect on viability, and how that may alter the meaning of this decision. More on this later.)

In its brief, the Justice Dept. charges that the *Roe* decision was "a source of instability in the law" to be reconsidered and abandoned, as the principles of the 1973 ruling were so sweeping that they block "modest and reasonable" state and local governmental efforts to control legalized abortions. The brief was filed July 15 in two appeals involving Illinois and Pennsylvania laws that restrict abortions.

This request marks the first time in 31 years that the government has asked the justices to reverse themselves on a basic constitutional decision. In 1954, the Justice Dept. successfully urged the Court to overturn its 1896 ruling on the constitutionality of "separate but equal" schooling.

Parties on both sides of the abortion fence agree that it is unlikely that the same justices who voted 6 to 3 in a smiliar case two years ago to reaffirm a woman's right to an abortion would overturn the 7-to-2

*Continued on page 8*

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# Half a Century of Social Security:
## Demographic Factors Complicate FDR's Dream

Social Security, the U.S.'s broadest-based social "safety net," celebrated its 50th birthday in August, facing fiscal and demographic challenges its founders could not have forseen when it was inaugurated.

During the 1930s, the U.S. experienced economic disaster and the accompanying collapse of the informal local- and charity-based social-insurance system that was supposed to care for the unemployed, indigent, disabled, and aged. A Cabinet-level committee chaired by Labor Secretary Frances Perkins took on the task of formulating proposals for ending the country's economic insecurity. One of its solutions: compulsory old-age insurance, which was signed into law by President Franklin D. Roosevelt in the Social Security Act of 1935.

In many ways, Social Security contains an inherent self-contradiction: it is a social-insurance system disguised as a pension. This contradiction was no oversight, though; Roosevelt was adamant that Social Security be financed through payroll taxes (like a pension reduction) rather than through general tax revenues, precisely so payers would feel a "concept of earned right" when their time came to receive payments.

But payees receive far more than they paid into the system (a contradiction masked by the largeness of its paying population compared to the recipient population). And instead of financing its payments from some titanic trillion dollar pension fund, since 1939 Social Security has been financed on a "pay as you go" basis, with payroll taxes being paid out almost as rapidly as they come in and only a modest "cushion" (in the tens of billions of dollars) in reserve.

The history of Social Security since its founding has been primarily a story of program expansion. The population included in the system has grown from 60 to 95 percent of the labor force. The program in 1956 extended assistance to the disabled, and Medicare health insurance to the elderly in 1965.

In 1972, automatic cost-of-living adjustments were legislated, replacing the traditional Congressional ad hoc approach. At this time, however, the prospect of future income shortfalls became apparent, causing the managers of Social Security over the past decade to grapple with demographic and fiscal long-range problems, as the consequences of the Social Security contradiction (Social Security's attempt to be both a pension plan and social insurance) became apparent.

In 1977, in a first attempt to solve the problem, Congress "decoupled" cost-of-living rates from benefits in the future. But future demographic difficulties were becoming apparent: the increasing life expectancy of the older generation, combined with shrinking cohorts of Social Security-paying workers from the baby bust, loomed ominously. Also, the economic problems of the 1970s and early 1980s—inflation, unemployment, and stagnation—conspired to nullify the effects of that repair.

In 1983, the National Commission on Social Security Reform made additional recommendations, which resulted the following year in Congress enacting a "bipartisan compromise." This compromise called for tax increases, a continuing delay in cost-of-living increases, some taxable benefits for high-income beneficiaries, and increasing the age of eligibility for unreduced benefits to 67 years (the new age limit will become effective in 2027).

When Social Security was launched, the U.S. population was relatively young. There were about 10 people of working age for every person in the 65-and-over age bracket. Today that ratio stands at 5 to 1. If the initial challenge of Social Security in the first 50 years has been to allocate funds horizontally across society, its new challenge is (in the understatement of Social Security Commissioner Martha McSteen) to share "the burden among affected groups, present and future."

With the 1984 reform now law, most Social Security watchers feel that the fund's solvency has been ensured until sometime in the 21st century. Social Security's own projections show a giant trust fund accumulating during the early 21st century, but declining sharply as the U.S. population continues to age (see the article on this subject by Robert J. Myers in the March 1985 *PT*). This demographic iceberg is coming, slowly but surely; but it is easy to be calm about problems nearly a century in the future. ☐

## Nortman Honored at PRB's Awards Dinner

Art Haupt

**Dorothy L. Nortman (right) receives the PRB Award for Outstanding Contribution to the Field of Demography, presented by PRB Board member Laura M. Olson. Nortman is author of the definitive *Population and Family Planning Programs* (see article on next page). For this and other events at PRB's Annual Awards Dinner held on Oct. 24, see next month's *P.T.***

## FROM THE EDITOR'S DESK

"We know remarkably little" about the ebb and flow of U.S. immigration, concluded the National Academy of Sciences last summer in its report, *Immigration Statistics: A Story of Neglect* (see *PT*, July/August 1985). It "found an extraordinary lack of concern" about acquiring and analyzing such statistics, and gave a special box of the ears to the Immigration and Naturalization Service.

Whether or not the INS is the heavy (and it does collect and ultimately publish statistics on legal immigrants), this country surely has a relaxed attitude toward migration data. How many undocumented aliens are there? Hard to say. How many people emigrate? No one does, of course, but to humor statisticians we'll arbitrarily peg annual emigration at 40,000.

This attitude seems particularly remarkable compared to the doggedness with which this nation pursues every other kind of data (e.g., 7.1 million cases of spinach were produced nationally in 1977). In ancient times, the census—reducing the populace to numbers—was considered somehow the Devil's work. Maybe that's our national subconscious opinion of migration stats.

*—Art Haupt*

# Title X Continues To Divide Capitol Hill

Title X of the Public Health Service Act, which funds family planning services in the U.S., has become one of the most longstanding controversial topics on Capitol Hill. Traditionally, the program's critics have been from groups considered outside mainstream politics, or members of Congress too few to mount much legislative opposition. However, with the emergence of the New Right in the late 1970s, family planning critics have assumed positions of power, a potentially important development for the future of family planning services.

In the past, Title X has enjoyed strong bipartisan support in Congress. In 1981, however, the provision was subject to unprecedented attacks from ranking members of Congress, though it was reenacted for another three-year period. In 1984, Title X was granted a one-year extension, rather than the usual three-year reauthorization, a result of strong objections on the part of Senate Labor and Human Resources Committee Chairman Sen. Orrin G. Hatch (R-Utah) and the chairman of the Subcommittee on Family and Human Services, Sen. Jeremiah Denton (R-Ala.).

In the Democratically controlled House, however, the Title X programs have received a much warmer reception. Twice in 1984 under the leadership of Rep. Henry A. Waxman (D-Calif.) and Rep. Edward R. Madigan (R-Ill.) a majority of House members voted to renew Title X. However, because of Senate action, Congress was forced to reauthorize the program for only one year. This one-year limit has since ended and the Title X programs are being financed through a continuing appropriations resolution until Nov. 14, 1985.

This year, congressional action on Title X has received the same rough treatment as last year. Opponents of Title X are still attempting to alter the structure of the program, by adding amendments, such as the one which would prohibit the provision of any type of information or counseling regarding abortion for women who faced unintended pregnancies (currently Title X regulations require that recipients provide nondirective counseling about abortions as a possible way to terminate unwanted pregnancies). Title X's supporters, concerned about the proposed alterations, are struggling to continue the present program with the funding reauthorization. As of this writing there are no immediate plans to bring the reauthorization bills to a vote in the two houses, and the conflict could be settled (or left unsettled) by a continuing resolution that re-funds most of the federal government at present levels. ☐

# Ostrander Named New Population Coordinator

Nancy Ostrander was appointed Coordinator for Population Affairs Sept. 23, the U.S. State Dept.'s highest officer concerned with population.

A career Foreign Service Officer, Ostrander was Ambassador to Suriname 1978-1980, and has served in Cuba, Jamaica, and Mexico. Most recently, she has been Diplomat in Residence at Indiana and Purdue Universities.

The Coordinator for Population Affairs has a role in developing U.S. international population policies, and negotiates with other governments and international organizations concerning these policies.

The previous Coordinator was Amb. Richard E. Benedick, who in August 1984 asked to be reassigned to another State Dept. post after the Administration excluded him from the diplomatic delegation to the International Conference on Population (for dispatches from this front, see *PT* for most of 1984). The post itself has been vacant for the past year (though the Coordinator's office has continued to function), and it remains to be seen what Ostrander can do with a position whose authority and jurisdiction are in a state of flux. ☐

# LDC Contraceptive Use Detailed in New 'Fact Book'

The definitive reference on where contraceptive prevalence stands in developing countries, the 12th edition of Dorothy Nortman's *Population and Family Planning Programs: A Compendium of Data Through 1983,* has been published by the Population Council.

While the Compendium (universally referred to by grateful researchers as "the Nortman Fact Book") details various economic and social data for most of the world's developing countries, the book's real treasures are its tables giving official population policies for 84 countries

*Continued on next page*

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(Table 6), and broad data on family-planning acceptors in 21 developing countries (Tables 15-18); (see "Take A Number" page 10). Nortman has assembled the best available collection of this not-easy-to-find data, showing acceptors by (where available) method, number of living children, and other variables.

The table showing acceptors as a percentage of married women of reproductive age (MWRA) is especially instructive. The percentage varies widely among the 39 countries listed—from Pakistan's 6.4 percent (as of 1980) to China's 69.5 percent (as of 1982). Countries like Colombia (with 55.1 percent, as of 1984) and Jamaica (with 51.4 percent, as of 1983) have also shown major increases during the past decade. (The reproductive age sampled varies from 15-44 to 15-49 in different countries.)

Among the 39 countries for which data are supplied, sterilization appears to have been the most widely used contraceptive method (used by 15 percent of MWRA), followed by IUDs (used by 12 percent), oral contraceptives (8 percent), and other (10 percent). ☐

*Population and Family Planning Programs: A Compendium of Data Through 1983,* by Dorothy L. Nortman, is available for $7.00 postpaid from the Population Council, One Dag Hammarskjold Plaza, New York, N.Y. 10017.

## NEW FROM PRB

### New U.S. Data Sheet

U.S. life expectancy varies, depending on where you live. You can, for example, expect at birth to live over 7 percent longer in Hawaii (ranked No. 1) than in Louisiana (ranked No. 50).

Life expectancy rankings by state, obtained from the National Center for Health Statistics, are a new column of data in PRB's just-published *United States Population Data Sheet*. This fifth edition of PRB's colorful 18½ x 24 inch wallchart displays a plethora of statistics on the U.S.'s nine regions, 50 states, and national capital.

The life-expectancy variation in other states reveals some surprises. For example, New Jersey, sometimes maligned because of chemical industry problems, turns out to have a better than average life expectancy, certainly better than its below-average neighbors New York, Pennsylvania, and Delaware.

Why does life expectancy vary from state to state? Keep in mind that the age structure of a state population does not affect life expectancy since this figure is based on age-specific mortality statistics.

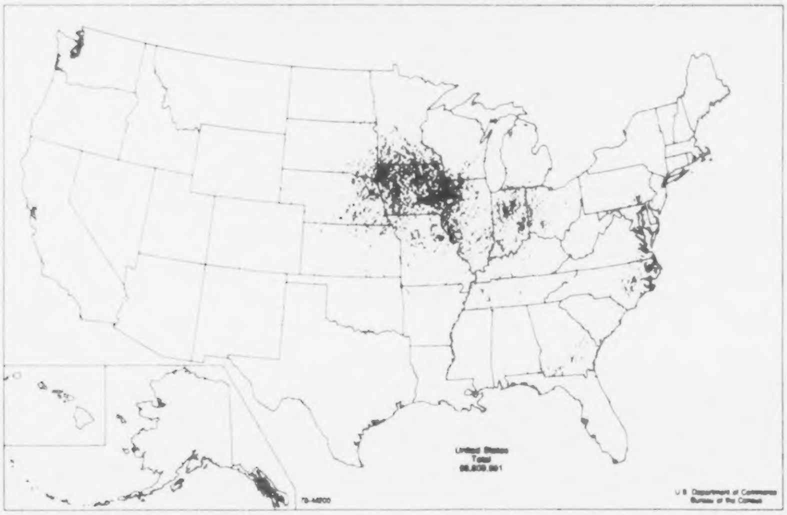
A state's minority population can, however, affect life expectancy, as most minority groups, except Asian Americans, have lower life expectancy than whites (Hawaii, whose population is 47 percent Asian American, has the country's highest life expectancy). Blacks have a significantly lower life expectancy than whites (70 vs. 75), and a state's life expectancy tends to be lower, depending on the relative size of its black and Hispanic population.

Other new columns on the fifth edition Data Sheet:

- The U.S.'s 3.5 million Asian Americans (as of 1980) are shown by state. The five with the most Asian Americans: California, Hawaii, New York, Illinois, Texas.
- Infant mortality rates are ranked by state (as of 1982). The five states with the lowest IMR: Hawaii, Maine, Colorado, Arizona, Vermont.
- The state capitals of the U.S. are listed, with their populations (What state's capital is Frankfort?). The five most populous: Phoenix, Indianapolis, Columbus, Boston, and Denver. Montpelier, with 8,000 people, has the smallest capital population of any state. ☐

Copies of the *United States Population Data Sheet* (fifth edition) are $2.00 per single copy; 2-10 copies, $1.75 ea.; 11-50, $1.50 ea.; over 50, $1.25 ea. Send order and remittance (with $1.00 handling on orders of $20 or less) to Population Reference Bureau, Inc., P.O. Box 35012, Washington, D.C. 20013.

## SPEAKING GRAPHICALLY



This is a population density map of the U.S. But, we ask you, of what population? One *PT* staffer guessed that it had something to do with an ashtray being spilled 37,000 feet over Iowa, but that's not it. For the answer, see page 10.

### Census Catalog and Guide

The Census Bureau's new 1985 catalog has always been a good one-volume resource on just what is available from the Bureau, but now it's even better.

Besides a listing of data and reports available, the *Census Catalog and Guide* gives an expanded subject index and detailed telephone contacts at the Bureau itself, its regional offices, and demographers and statisticians in the states.

Added this year is a series of "mini-guides," reproductions of issues of the Bureau's *Factfinder for the Nation* newsletter which gives excellent summaries of topics such as Census geography, the Census of Agriculture, and international programs, among others.

With this publication, the Bureau can make you more than just an educated consumer—you can become an instant (well, almost instant) expert. ☐

*Census Catalog and Guide 1985* is available from the U.S. Government Printing Office, Washington, D.C. 20402. 358 pp.. Price $13.00. GPO stock number S/N 003-024-06331-0

# DEMOGRAPHER'S

## The Last Metro (Definition)?

by Carl Haub

Judging by the questions that come in to PRB, the new (1983) definition of U.S. metropolitan areas has caused some confusion for those who use the data.

SMSA is dead. Long live MSA. This article should help set forth some of the differences between the old and new metro areas. While space does preclude discussing all criteria of the qualifying rules, the References (see below) will afford more details for the brave souls who wish to pursue this subject further.

The government has defined consistent metro areas since 1950, largely because U.S. city boundaries do such a poor job of describing them. A metro area has long been defined as a large population nucleus, with its economically and socially related adjacent communities. This concept may be obvious, but setting down a body of rules to define one proves more difficult than at first glance.

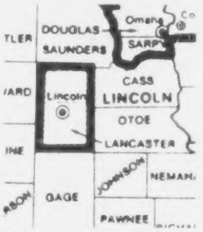
Metro club membership itself can be prestigious for a city and, perhaps more importantly, can qualify a city for federal grant money. It may make an area more "visible" so that it can then attract investment with its lofty status. Signs in city airports (no matter how small) can proclaim: "Welcome to the Greater Mudville Metro Area, the Nation's Corrugated Beeswax Capital!"

The old system of defining metro areas, Standard Metropolitan Statistical Areas (SMSAs), first set up for the 1950 Census, has now been superseded by a multitiered system of classification. "SMSA" has departed as a title and has been replaced by such esoteric acronyms as "MSA," "PMSA," and "CMSA." Why all this fuss, you ask, when we were all so satisfied by our nice, cozy SMSAs?

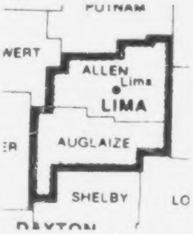
### How It Was

The original method of defining whether or not an area was "metro," statistically speaking, used the county as the basic "building block" of a metro area (as does the new method). Counties are used because they are the smallest units for which a wide variety of data are readily available. Data and estimates are also available for counties during the 10 long years between censuses, another very salient point. In some cases, independent cities, such as Baltimore, Md., and the many independent cities of Virginia are treated as "county equivalents."

Under the original method, once a city (or contiguous "twin cities") reached a population size of 50,000, its county of location could officially become metro. The smallest possible SMSA was a single county, sitting by itself, containing an urban area of 50,000 population. This fundamental concept applies today in the Lincoln, Neb. MSA (see inset). It consists only of Lincoln's county of location, Lancaster Co. Thus, we have a "single-county" metro area.



An SMSA could grow to be a multicounty metro area when it was shown to have close economic and social ties to a neighboring county or counties, e.g., significant commuting from an adjacent suburban county for employment. An example would be the Lima, Ohio metro area, comprised of Allen County and the central city of Lima and neighboring Auglaize County (see inset). The metro areas of the larger cities, of course, consist of quite a few contiguous counties. The Indianapolis metro area contains eight counties, for example.



As time went on, appeals about special situations modified the rules on central city size (Benton Harbor, Mich. and Poughkeepsie, N.Y. are two cities that made such appeals in order to gain SMSA status.) As a result, only a dense concentration of 50,000 or more population is really necessary to be considered for metro status. Under the new definition, MSAs and SMSAs differ little in concept, although the rules have varied with time.

### A Digression

In setting up any statistical definition (classification is, after all, the scientist's biggest challenge) one will quickly run into exceptions. In New England, counties are of no importance as governmental units, so the New England "town" (or city) is used to build metro areas. New England County Metropolitan Areas (NECMAs) are still defined by the Census Bureau for those who wish to use county-level data there.

Some cities have legal boundaries which are quite small compared to their actual built-up area. The Hickory, N.C. Urbanized Area contains 62,000 people, but the limits of Hickory itself contain only 21,000. Others, due to strict legal restraints, have trouble annexing territory when they overflow their original boundaries.

In that last paragraph, we also slipped a new term into the discussion—"Urbanized Area" (UA). That definition of a "city" often makes more sense in that it includes a city and its continuously built-up area, disregarding county boundaries. A UA is, then, analogous to a "city's" appearance if

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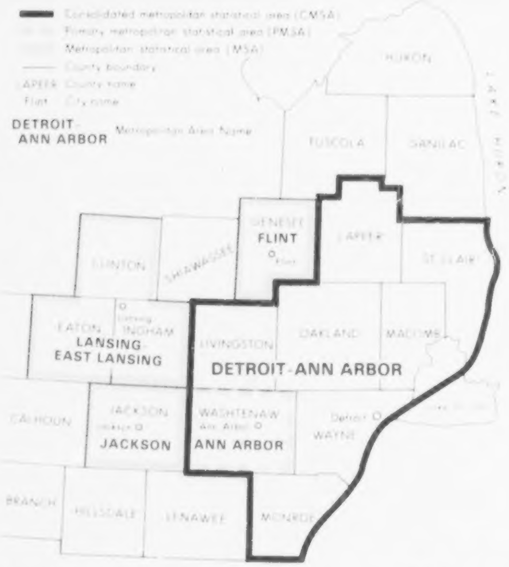
Carl Haub is PRB's Director of Demographic Analysis and Public Information.


Consolidated metropolitan statistical area (CMSA)
Primary metropolitan statistical area (PMSA)
Metropolitan statistical area (MSA)
County boundary
LAPEER County name
Flint City name
DETROIT-ANN ARBOR Metropolitan Area Name
HURON
LAKE HURON
TUSCOLA
SANILAC
GENESEE
FLINT
Flint
LAPEER
ST. CLAIR
CLINTON
SHIAWASSEE
EATON
Lansing
INGHAM
LANSING-EAST LANSING
LIVINGSTON
OAKLAND
MACOMB
DETROIT-ANN ARBOR
CALHOUN
JACKSON
Jackson
JACKSON
WASHTENAW
Ann Arbor
ANN ARBOR
Detroit
WAYNE
BRANCH
HILLSDALE
LENAWEE
MONROE

viewed from the air. Thus a UA includes less population than an MSA, but also eliminates much territory which is sparsely inhabited due to large or oddly shaped counties. Data are published for UAs, but only for every tenth year—when a full census is taken.

## How It Is

Metropolitan areas are defined by the Office of Management and Budget with technical support from the Census Bureau. The new definition took effect on June 30, 1983 and can be summarized:

1. *Metropolitan Statistical Area (MSA).* A county may qualify as an MSA if:

   a) it contains a city of 50,000 or more population, using legal city boundaries to define the city.

   OR

   b) it contains an Urbanized Area of 50,000 or more population and the total metro population would be 100,000 or more. The 100,000 total requirement applies to the one or more counties which may comprise the metro area in question. In New England, the qualifying total is actually 75,000.

An MSA can be one county or group of counties and range in size from a 1984 estimated population of 65,400 (Enid, OK MSA) to 3,429,400 (Washington, DC-MD-VA MSA – the largest MSA). A few smaller SMSAs, established under the old rules, which may not meet the 100,000 population cutoff of the new rules, can be "grandfathered" into the new definition.

Recognizing that this system will label both New York and Victoria, Tex. as "metro," the new definition also sets up a hierarchy of MSAs. They are classed from Level A, areas of 1 million or more to Level D, areas of less than 100,000.

2. *Consolidated Metropolitan Statistical Area (CMSA).* A metro area may qualify as a CMSA if:

   a) it contains 1 million or more population (i.e., a "Level A" MSA)

   AND

   b) it contains a qualifying Primary Metropolitan Statistical Area (PMSA) within it (see below).

The PMSA is one of the more novel aspects of the new definition. This classification sets up a two-tier system within the larger MSAs.

3. *Primary Metropolitan Statistical Area (PMSA).* A county or group of counties may qualify as a PMSA if:

   a) local opinion supports separate recognition for a county or group of counties which demonstrate relative independence within the metro complex. (Nearly all PMSAs qualified in this way.)

   OR

   b) it had previously been recognized as a metro area on January 1, 1980 AND local opinion supports its continued recognition as such.

The "two-tier" CMSA-PMSA represents a broadening of the old Standard Consolidated Statistical Area (SCSA) which was applied to the largest metro areas. New York and Chicago were first so defined in 1960 and the number rose to a high of 17 in 1981. An SCSA was composed of separate SMSAs showing uninterrupted urban development (e.g., New York City—Jersey City) and a large volume of commuting, but not a large *percentage* of commuting.

The CMSA-PMSA definition essentially recognizes that metro area growth has several aspects. One is that a large area can gobble up smaller "satellite cities" which may qualify for metro status on their own. Another is that areas near large cities have become more economically independent. Still, no PMSA will come into existence without significant local support. No one in Ft. Worth, Tex. wants to hear that it has become statistically subordinate to Dallas, hence the Dallas-Ft. Worth, TX CMSA. Newport News and Hampton, Va. could have opted for PMSA status, but didn't. Thus, the new definition tries to reflect the true structure of U.S. metro areas in a consistent manner while taking the many local "special cases" into account.

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The large accompanying map illustrates each type of metro area: single county MSAs (Flint and Jackson), multicounty MSAs (Lansing-East Lansing), and a CMSA (Detroit, including the Ann Arbor PMSA). We should note here that the balance of the Detroit CMSA (i.e., excluding Ann Arbor) is listed as the "Detroit PMSA" in Census Bureau tables; the dashed line serves to separate the Ann Arbor and Detroit PMSAs. Another issue is the definition of which cities are "central cities" and which are not, but space precludes a detailed discussion here.

The metro definition does have its complexities. The titles alone serve warning to the casual researcher that a long day may be ahead: New York-Northern New Jersey-Long Island, NY-NJ-CT CMSA, Visalia-Tulare-Porterville, CA MSA and Davenport-Rock Island-Moline, IA-IL MSA.

As one wag has put it, the system of classifying metro areas should perhaps carry the "don't try this at home" warning label. But, in truth, if what you're after is metropolitan or cosmopolitan or just plain rankings (my PMSA is bigger than your PMSA!), the new metro definition is probably flexible enough to satisfy you. ☐

### References

Beale, Calvin L., "Poughkeepsie's Complaint or Defining Metropolitan Areas", *American Demographics*, January 1984.

Forstall, Richard L. and Maria Elena Gonzalez, "Twenty Questions, What You Should Know About the New Metropolitan Areas", *American Demographics*, April 1984.

U.S. Bureau of the Census, *1980 Census of Population*, Supplementary Report, "Metropolitan Statistical Areas", PC80-S1-18, U.S. Government Printing Office, Washington, D.C.

*Author's note.* Thanks to Richard Forstall of the Census Bureau for his assistance with this article; PRB is, however, solely responsible for its contents. Mr. Forstall will be happy to provide additional answers on the metro definition. He may be reached at 301-763-5184.

## Abortion in America

*Continued from page 2*

*Roe* decision. (Five of the justices are over 75 years old, however, and a shift of only two seats in the Supreme Court could swing that 6-to-3 affirmation.)

### The Demographics of Abortion

Who are the women obtaining abortions? In 1981, the most recent year for which detailed characteristic data are available, most abortions were obtained by young women, unmarried women, and white women. About 1.6 million abortions were reported for the U.S. in 1981 representing about 26 percent of pregnancies that year (The Alan Guttmacher Institute [AGI] estimates virtually the same number for 1982). Thirty-five percent of all abortions were obtained by women aged 20-24; women 30 or more years of age accounted for 16 percent. The teenagers' share of all abortions was 28 percent; 3 percent of those were provided to girls under 15. AGI each year estimates the number of U.S. abortions, based on its own surveys of abortion providers and detailed surveillance data from the Centers for Disease Control.)

Seventy percent of abortions in 1981 were obtained by white women. The abortion rate (number of abortions per 1,000 women aged 15-44) and ratio (which AGI defines as the number of abortions per 1,000 abortions-plus-live-births) are higher for nonwhites than for whites, though among those under 20, the abortion ratio is highest for whites.

Unmarried women accounted for the lion's share of abortions: about 81 percent. Five percent of all unmarried women of childbearing ages obtained abortions in 1981, compared with about 1 percent of married women. In general, single women experience almost twice as many abortions as births, while married women have almost 10 times as many births as abortions.

The majority of women who terminated their pregnancies, 58 percent, had had no previous live births, and 65 percent had had no prior induced abortions. Nearly 25 percent had obtained one prior abortion, 7 percent two prior abortions, and 3 percent three or more.

### Trends and Services

The U.S. abortion rate remained essentially stable in 1981 and 1982, after rising each year between 1973 and 1980. The annual increases in the years just prior to 1980 were small.

The proportion of abortions obtained by women who have had one or more previous abortions continues to rise. This appears to be a result of a growing population of women who have had abortions, and who are, therefore, at risk of repeat procedures.

In 1981, as in 1980, 91 percent of abortions were performed at 12 or fewer weeks past the last menstrual period (weeks LMP). Half of all abortions were obtained at 8 weeks LMP and fewer than 1 percent at more than 20 weeks.

Abortion services are most available, and rates are highest, in states on the East and West coasts. Most abortions are performed in metropolitan counties – only 2 percent of abortions were performed in nonmetro counties in 1982.

In 1982, 82 percent of abortions were performed in nonhospital facilities: 56 percent in clinics which specialize in abortion services, 21 percent in other kinds of clinics, and 5 percent in physicians' offices. In 1983, women paid an average of $200 for a first trimester nonhospital abortion.

### Future Prospects

The viability of the fetus is at the core of the Supreme Court's 1973 *Roe v. Wade* decision, which allows for heavy restrictions on abortions performed after the fetus is considered viable. But the more advances there are in neonatal care, the earlier the age at which a fetus can live outside the womb. Doctors cannot say for certain after what length of gestation a fetus can be considered

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*Continued from preceding page*

viable, though it is generally agreed that before 24 weeks there is no chance for any independent existence. Nearly all healthy babies born prematurely at 28 weeks survive, the point of fetal viability cited by the Supreme Court. One great uncertainty of the abortion debate is the potential impact of major technological advances, such as the development of an artificial womb, which would change the common perception of viability.

For many abortion advocates, the abortion debate can be boiled down to one major issue: the right of women to control their own bodies. This right includes unrestricted access to safe and legal abortion. Legal or not, abortion is not about to disappear, these activists believe. Its prohibition, while possibly discouraging some women from terminating their unwanted pregnancies, will simply force others to seek dangerous alternatives to today's safer methods. In the view of prochoice advocates, this freedom of choice is more important than the potential life of the fetus.

For most prolife advocates, the bottom line is just as apparent: abortion is morally wrong. They seek legal recognition that human life begins at conception: anti-abortion bills such as the Human Life Amendment, which outlaws virtually all abortions by declaring that life begins at conception, have been considered by Congress. Recognizing that the prohibition of abortion will not dissuade some women, some prolife groups have started programs which offer alternatives for pregnant women. For the last two years the Moral Majority's "Save the Baby" program has arranged free medical care for pregnant women anywhere in the U.S., along with free room and board during the duration of their pregnancy, as well as the use of adoption services, if desired.

Twelve years after being made legal, abortion in the U.S. faces the dawn of a new era, in which its politics figure prominently. Vociferous abortion foes cannot be expected to quietly fade away: if anything, the debate may get louder as prochoice activists launch efforts to match the campaign of the right-to-life movement. ☐

## WORLD FOOD NEWS

This month, World Food News has good news to report. The UN Food and Agriculture Organization (FAO) has raised its forecast of world cereal production in 1985 to a record 1.884 billion tons, some 39 million tons more than 1984. One bright note is that 1985 harvests will be much better than last year in most of previously drought-affected western and eastern Africa, with some countries even accumulating exportable surpluses (estimated by FAO at 1.3 million tons).

FAO forecasts global carryover stocks at the end of the 1985-1986 season will rise by 50 million to a record 358 million tons, with most of the increase in the U.S.'s coarse grain holdings. With abundant harvests and no major regional crop failures anticipated, world cereal trade is forecast to fall sharply in 1985-1986 to 194 million tons, a decline of 11 percent from the previous year. Better harvests in the USSR will lead to reduced cereal imports, while the shipments of most major exporters, in particular the U.S., are expected to decline. ☐

World Food news is prepared by the North American Liaison Office of the Food and Agriculture Organization of the United Nations.

## Population Update

Estimated United States Population:

| | |
|---|---|
| As of June 1, 1985 | 238,616,000 |
| As of June 1, 1984 | 236,502,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports,* Series P-25, No. 968.

Estimated World Population:

| | |
|---|---|
| As of November 1985 | 4,873,000,000 |
| Annual Growth | 82,000,000 |

Estimated by extrapolation of the mid-1985 world population given on the 1985 World Population Data Sheet.

### Latest Provisional Statistics for the U.S.: June 1985

| | 12 months ending with June | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,742,000 | 3,631,000 | 15.8 | 15.5 | 15.9 | 15.9 |
| Deaths | 2,078,000 | 2,031,000 | 8.8 | 8.6 | 8.6 | 8.5 |
| Natural increase | 1,664,000 | 1,600,000 | 7.0 | 6.9 | 7.3 | 7.4 |
| Marriages | 2,447,000 | 2,454,000 | 10.3 | 10.4 | 10.6 | 10.6 |
| Divorces | 1,160,000 | 1,161,000 | 4.9 | 4.9 | 5.1 | 5.2 |
| Infant deaths | 39,300 | 39,200 | 10.5 | 10.8 | 11.0 | 11.4 |
| Population base (in millions) | ... | ... | 237.3 | 234.9 | 232.7 | 230.5 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

*Source. Monthly Vital Statistics Report* (Vol. 34, No. 6) from the National Center for Health Statistics.

## POSITIONS/ PROFESSIONALS

**Editor/Creative Director,** for private, nonprofit organization in Washington, D.C., to work on project aimed at conveying research findings to Third World policymakers. *Qualifications:* appropriate managerial experience in creative design and production of written and A/V materials for lay audiences; knowledge of population issues, Third World experience, advanced degree and foreign language skills desirable. *Salary:* negotiable. *Contact:* P.O. Box 35012, Washington, D.C. 20013. Attention: Search Committee.

**Population Coordinator,** U.S. Agency for International Development, to be contracted under a 2-year personal services contract to work in Niamey, Niger, to be responsible for the overall planning, development, monitoring, and coordination of AID-supported population/family-planning activities in Niger. Coordinator reports to USAID/Niamey Health Development Officer. *Qualifications:* graduate degree in, and demonstrated knowledge of, the population/family-planning-related field; African experience; French language proficiency; knowledge of AID. *Send Curriculum Vitae and Salary Requirements to:* Dawn Liberi, USAID/Niamey, AID, Department of State (ID), Washington, D.C. 20523. *Closing Date:* Dec. 1, 1985.

**Data Processing Specialists,** to handle data processing needs of the Demographic and Health Surveys (DHS). *Qualifications:* Micro and mainframe experience; some knowledge of the population field; fluency in French or Spanish; and some training background; willingness to work in less developed countries one-third of time. *Salary:* $22,000-$32,000, based on skills and experience. *Contact:* J. Cushing, DMS/Westinghouse, Box 866, Columbia, Md. 21044.

**Country Monitors,** to work on DHS country projects. *Qualifications:* graduate training in population or health; experience with surveys, preferably in less developed countries; fluency in French or Spanish; and willingness to work in less developed countries one-fourth of time. *Salary:* $30,000-$36,000, based on skills and experience. *Contact:* J.M. Sullivan, DHS/Westinghouse, Box 866, Columbia, Md. 21044.

The map on page 5 shows the hog and pig population of the U.S., from the 1978 Census of Agriculture. 1 dot = 10,000 porcine production units, for a total of 58,809,991.

## TAKE A NUMBER . . .

**Real Decline in U.S. Educational Quality?:** A recent Census Bureau analysis indicates, among other things, that there is statistical evidence of lower quality education in the country. Much attention has been given to declining Scholastic Aptitude Test scores, used for college entrance in the U.S. Two-thirds of the decline in these scores from 1963 to 1970 can be attributed to the fact that the proportion of 18-year-olds going to college increased, resulting in a lowered ability level for test-takers in general. But, after 1970, most score declines occurred *within* ability groups.

A 1974 test on functional literacy, which tested such things as the ability to read simple signs, showed 13 percent of all 17-year-olds scoring less than 75 percent. This proportion was 41 percent for blacks and 31 percent for other nonwhite races. Since that time, reading comprehension tests show little improvement across age groups.

**Population Policy Update:** According to the Population Council's 12th edition of *Population and Family Planning Programs* fact book, three-fourths of the population of less developed countries live in countries with an official policy to reduce the population growth rate (see article, page 4). This varies from 10 percent in sub-Saharan Africa to nearly 100 percent in South Asia. In the less developed countries, excluding China, 24 percent of currently married women of reproductive age were estimated to be using contraception; this rises to 38 percent when China is included.

**More Frequent Counts:** The U.S. may have decided not to take a mid-decade census, but a number of Asian countries now look with favor on these quinquennial exercises. Australia, Canada, Japan, New Zealand, and South Korea have taken five-year counts for some time, but now Sri Lanka and Bangladesh see the need for more frequent counts in order to keep pace with faster demographic changes. Indonesia, Thailand, and Hong Kong also plan repeats of their major mid-decade surveys (in Hong Kong, it's called a "by-census"). The need for such a census in the U.S. is brought to our attention time and time again by researchers who contact PRB for updates on U.S. ethnic groups or data on smaller geographic areas (such as states) and must either settle for estimates now, or wait until about 1993 for an answer.

**More Natives in Britain:** The percentage of births to British-born mothers has been slowly rising since 1980 as immigration slackens and the offspring of those immigrants are themselves first-generation Brits, the *Economist* reports. A similar trend toward national-born mothers can also be noted in data from West Germany.

## . . . addenda

Drawing by Vietor. Copyright 1985 *USA Today*. Reprinted by permission.

"Don't mind me. I'm a people watcher."

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 2213 M St., N.W., Washington, D.C. 20037.*

**CHINA'S ONE-CHILD FAMILY POLICY, edited by Elisabeth Croll et al. New York: St. Martin's Press. 1985. 237 pages. $27.50.**

This measured account of China's one-child national population policy is viewed in the context of China's modernization efforts. The government came to view rapid population growth and a young age structure as a barrier to capital accumulation and economic development, requiring state intervention in fertility decisions. Separate essays focus on urban, rural, provincial and old age security aspects of the policy, as well as incentives and disincentives to observe the one-child policy.

The authors stress that the success of China's one-child policy hinges not only on policy changes but will be a question of translating those into fertility norm changes; the outcome is still most uncertain.

*—Alexander von Cube*

**REPRODUCTIVE CHANGE IN DEVELOPING COUNTRIES: Insights from the World Fertility Survey, edited by John Cleland and John Hobcraft. New York: Oxford University Press, 1985. 301 pages. $24.95. ISBN 0-19-828465-9**

The mandate for these 12 essays by staff members and close associates of the World Fertility Survey during its 12 years of operation, 1972-1984, was to "distill the contribution to demographic knowledge of the Third World made by the WFS" in its surveys of 230,000 women in 42 developing countries, as documented in what were already some 700 reports as of the end of 1983. The result of this formidable task is a highly readable, nontechnical account of the achievements, shortcomings, surprising and less surprising findings, as well as policy implications of the largest social survey ever undertaken.

WFS' greatest achievement, several authors observe, was to provide, for the first time, high-quality, crossnationally comparable data on the "proximate determinants" of fertility—contraception, nuptiality, fecundity, and breastfeeding. Among the shortcomings were a too-Westernized approach to fertility regulation in the core questionnaire and "obsessive perfectionism" in data preparation, which led to long delays in publication of many country reports.

Surprise findings included the high mortality among children born after intervals of less than two years and scant support for the current "dominant" theory that economic changes induced by modernization precipitate fertility decline. Instead, as Cleland puts it, the WFS suggests that fertility transition results from an innovation process—the spread of new ideas and lifestyles—a process that can be hastened by well-run family planning programs.

With such fascinating observations, the book illustrates the bountiful harvest that the WFS was and continues to be for students, educators, researchers, policymakers, and all who are concerned with development in the Third World.

*—Jean van der Tak*

**PRICING THE PRICELESS CHILD, by Vibiana A. Zelizer. New York: Basic Books. 1985. 277 pages. $18.95. ISBN 0-465-06325.**

From work houses to Romper Room—as U.S. children have become less valuable to their parents economically in the last 100 years, they have become more valuable emotionally, says sociologist Zelizer. But this process (which mirrors the transformation of the family from economic unit to sentimental institution) has brought its own social problems, including emotional exploitation of one's own economically "useless" children, and (in some critics' views) indifference and hostility to the children of others. Child liberation movement activists argue that allowing children to be "useful," to contribute work to the family unit and to achieve some financial independence, would ultimately help their status and dignity, and keep them from being treated as "an expensive consumer item."

*—Arthur Haupt*

# PUBLICATIONS RECEIVED

**AFRICA SOUTH OF THE SAHARA 1986**, 15th edition. London: Europa Publications, Ltd. (Distributed by Gale Research Co., Detroit, Mich.), 1985. 1089 pages. $135.00.

**THE BREAKING OF BODIES AND MINDS: Torture, Psychiatric Abuse, and the Health Professions**, edited by Eric Stover et al. American Association for the Advancement of Science. New York: W. H. Freeman, 1985. 319 pages. $11.95.

**THE CHICANO EXPERIENCE: An Alternative Perspective**, by Alfredo Mirande. South Bend: Notre Dame Press, 1985. 272 pages. $19.95.

**ECONOMIC DEVELOPMENT, SOCIAL STRUCTURE AND POPULATION GROWTH**, by Victor S. D'Souza. Beverly Hills, Cal.: Sage Publications. 136 pages.

**ENCYCLOPEDIA OF STATISTICAL SCIENCES**, Vol. 6. New York: Wiley, 1985. 758 pages. $85.00

**AN ENVIRONMENTAL AGENDA FOR THE FUTURE**, by Natural Resources Defense Council et al. Washington, D.C.: Island Press, 1985. 155 pages. $5.95.

**THE EUROPA YEAR BOOK: A World Survey**, Vols. I and II. London: Europa Publications Ltd. (Distributed by Gale Research, Detroit, Mich.), 1985. 2951 pages. $210.00.

**GOSSYPOL: A Potential Contraceptive for Men**, edited by Sheldon J. Segal. New York: Plenum Press, 1985. 271 pages. $45.00.

**LONGITUDINAL STUDIES OF ADULT PSYCHOLOGICAL DEVELOPMENT**, edited by K. Warner Schaie. New York: The Guilford Press, 1983. 332 pages. $32.50.

**MARYLAND AND AMERICA: 1940 TO 1980**, by George H. Callcott. Baltimore: The Johns Hopkins University Press, 1985. 376 pages. $27.50.

**THE ONE-PARENT FAMILY IN THE 1980s: Perspectives and Annotated Bibliography 1978-1984**, by Benjamin Schlesinger. Toronto: University of Toronto Press, 1985. 284 pages. $17.50.

**REFUGEES IN THE UNITED STATES: A Reference Handbook**, edited by David W. Haines. Westport, Conn.: Greenwood Press. 243 pages.

# SPOTLIGHT

## POLAND

Population (1985 est.): 37.3 million
Births per 1,000 pop. (1984): 18.9
Deaths per 1,000 pop. (1984): 9.6
Rate of Natural Increase: 0.9 percent
Total Fertility Rate: 2.4
Infant Mortality Rate: 19.2 infant deaths per 1,000 live births
Life Expectancy at Birth: 71 years
Exports: Coal, shipping, steel products, clothing
Imports: Grain, petroleum, chemicals
GNP per capita (1982): $4670
Capital: Warsaw

The largest by area and most populous of Eastern European countries, Poland lies on the Central European Plain, sloping upward into rolling hills and the Carpathian Mountains in the south. Its location at the center of Europe has for better or worse been a decisive determinant in its history through the centuries, as it has had to vie with neighboring countries for autonomy—most recently with the USSR, on which it now depends as a client state.

One result of this struggle has been acute changes in its population size and composition. McEvedy and Jones in their essential *Atlas of World Population History* put Poland's population in 1815 (present-day boundaries) at 10 million. At that time, the country did not exist, but had been absorbed into Russia, Prussia, and Austria.

The Polish population tripled during the subsequent century. In 1919 the Treaty of Versailles reestablished Poland as a country along expansive boundaries, encompassing part of Germany, and by the outbreak of World War II the number of people living under the Polish flag had reached 35 million. At that time nearly a third of the population consisted of minorities, including almost 10 million Germans, along with Ukrainians, who made up nearly 14 percent of the population, and Jews, who constituted some 10 percent.

The Nazi invasion and occupation had devastating consequences for Poland. Some 6 million people, including the great majority of the country's Jewish population, were killed, and Poland joined the tragic ranks of 20th century countries (including the USSR, Mexico, and Cambodia) where prolonged violence has significantly lowered the total population.

When the war finally ended, the country's boundaries were pushed 200 miles westward by the USSR, a change acceded to by the other Allies. The country's Germans (most of them Polish citizens but also including over a million civilians from Germany who had relocated in Poland during the war) fled westward, to be absorbed in the new country of East Germany. Meanwhile 1.5 million Poles (themselves expelled from the newly Russian-ized lands to the East) migrated westward into the new Poland and another 3 million Poles who had fled the country during the war were readmitted.

As a result of these upheavals, the population of postwar Poland in 1950 was 25 million—about the same level as that of three decades earlier, but with different boundaries and a different, homogeneous population composition. By the end of the 1970s, the Polish population surpassed the pre-World War II 1939 high of 35 million.

Photos displayed in a Warsaw photography studio.

Poland is a Communist country whose economy features shipbuilding, other heavy industry, and mining. The most populous city is Warsaw, the capital, completely rebuilt after the war with a current population of 1.5 million. Other major cities include Lodz and Krakow. The population is 27 percent rural, and the national government encourages people to stay on the land, instead of moving to the major cities, which have severe housing shortages and long waiting lists for apartments. Unlike other Eastern Bloc countries, agriculture is largely in private hands, with many staples sold directly from producer to consumer. Nevertheless, agriculture is hard pressed to meet food needs and some foods are rationed.

During the postwar era, population growth has been relatively rapid, with the birth rate reaching 25 per 1,000 population in the early 1950s. A liberal abortion law was instituted in 1956 (and has been liberalized since then, despite increasing opposition from the Catholic Church). A 1950s campaign to encourage smaller families resulted in a drop in the birth rate to around 16.2 births per 1,000 population in 1968. Since then, a series of pronatalist campaigns have been paralleled by a rebound in the birth rate, which is now around 19. (Poland's fertility trends have not followed the common European pattern of steady decline toward replacement level.) With the exception of tiny Albania (whose rate of natural increase is 2.2 percent), today Poland's 0.9-percent population growth is the highest in Europe, and slightly higher than the USSR's. ☐

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# POPULATION TODAY

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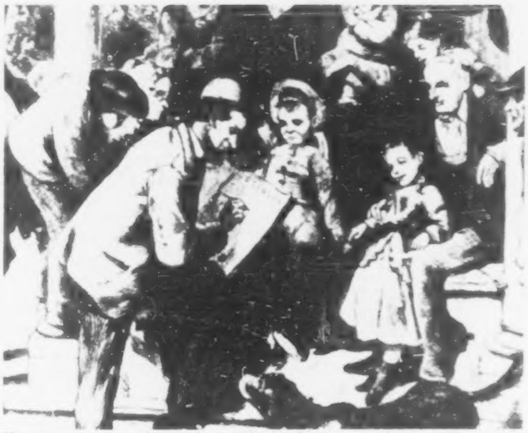

Enumerator takes the 1880 Census, from *Harper's Weekly*. See inside for a Census commentary (page 2), a warning about misuse of statistics, from the Census Director (page 8), and a look at census predictions past (page 14).

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# The 1990 Census: Coping with Bigness

1990 is coming, and so is the U.S.'s next decennial Census. While Census Day is over four years off, the Census Bureau's Decennial Planning Division has already been working on it for the past three years.

Two extensive test censuses were held in 1985 in Jersey City, N.J., and Tampa, Fla., to evaluate new procedures and equipment. Full-scale population and housing censuses will be conducted in parts of Mississippi and Los Angeles Co., Calif., on March 16, 1986. By early 1987, a little more than a year from now, the final methodology and subject matter will be settled, and the year after, a major dress rehearsal will be performed. All this is leading up to April 1, 1990—Census Day.

1990 will also mark the 200th anniversary of the first decennial census, conducted in 1790 under the auspices of the Dept. of State and its Secretary Thomas Jefferson. Then, census takers on horseback counted 3.9 million American people. For 1990, the Bureau faces the challenge of keeping the population of temporary census takers in the quarter-million range, and the cost of the operation nearer to $1 billion than $2 billion.

Like other manifestations of modern life, headcounting is more complex than it used to be. The question is whether the census has crossed the same threshold as say, the Summer Olympics or the U.S. government itself, such that its very importance and bigness affect the accomplishment of its mission.

Has the Census come to that point? Its role under the Constitution has been to apportion Congress, but decade by decade it has taken on other, multiple roles—gathering population characteristics and establishing bases for the distribution of many federal programs. As a result, it has been caught between the need for more rapid gathering and dissemination of data, and the constrictions of increasing costs and forces trying to make the census into a political football. (Although the 1980 Census was the most accurate ever, for these reasons it was one of the most controversial.)

For 1990 the Bureau hopes to keep the problems of collection and cost under control by planning streamlined, more automated procedures. One way would be to have respondents' filled-out census forms transferred into computers at the earliest stage possible, perhaps at the hundreds of district offices running the census at the local level. (In 1970, this was done at only three large data depots.) This might even be facilitated by computers reading handwritten answers, though it is not yet clear technology will be able to do this on a mass practical basis by 1990.

The recent tendency of the census to become a political football is less easy to resolve. The Bureau was able to release the 1980 Census results on time, but only despite legal complications caused by about 50 lawsuits disputing different aspects of the census.

*Continued on page 7*

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# House, Senate Closer on Immigration Reform

Both the Senate and the House seem committed to revising U.S. immigration law. Though the two branches of Congress look primarily toward employer sanctions and increased expenditures for border enforcement to curb the flow of illegal aliens. But as in previous years, some major stumbling blocks remain which may hinder any chance of a new immigration law being approved.

On Sept. 19, by a vote of 69 to 30, the Senate passed its version of the immigration legislation. This bill outlaws the known hiring, recruiting, or referring of any undocumented workers and fines employers up to $2,000 per illegal worker for the first offense. A second offense carries a fine of $2,000 to $5,000 per illegal worker, and the employer could receive a court order to stop hiring illegal aliens. Third violations would carry a maximum fine of $10,000. There is also a provision with fines of up to $3,000 per illegal worker and six months imprisonment for an employer convicted a second time for a pattern of hiring illegals. Before this bill, only illegal employees could be prosecuted while employers could legally hire unauthorized aliens.

Other measures aimed at curbing the immigration of illegal aliens include an increase in federal funds for border enforcement and the establishment of a nine-member commission to determine whether employer sanctions and increased border enforcement succeed in curtailing the flow of illegal aliens into the country.

The only section of the Senate bill that stirred heated debate was an amendment offered by Sen. Pete Wilson (R-Calif.). It calls for a special "alien allowance" for growers of perishable crops. Though all other businesses would have to stop hiring illegal aliens immediately, Wilson persuaded his colleagues to allow 350,000 seasonal farm workers into the country at any one time for nine months by simply applying for a visa.

The House bill, which as of this writing has gone no further than markup in the House Immigration Subcommittee, resembles the Senate bill. Any person is barred from knowingly hiring, recruiting, or referring (for a fee) an illegal alien. The maximum fine after three violations is $5,000 (as opposed to the Senate's $10,000). As in the Senate bill, punishment for multiple offenses on the part of employers may include imprisonment. Increased funds for border enforcement are also part of the House's solution to curbing the entrance of illegal aliens.

Amnesty for those undocumented aliens who can prove they have lived in the United States continuously for a specified period of time is another new reform upon which both Houses agree. The Senate bill would grant legal status to those aliens who have been living in the U.S. since before Jan. 1, 1980. The House bill carries a Jan. 1, 1982 date; this later cutoff would allow many more aliens to legally become U.S. citizens. Both provisions will reduce the chance of any future mass deportations.

The House Immigration Subcommittee has decided to delay their version of the controversial Wilson proposal until some future date. Nevertheless, Rep. Daniel Lungren (R-Calif.), who proposed the House guestworkers clause during the House markup, made it clear that he plans to bring up his proposal dealing with foreign farm workers only when the bill is heard before the full committee and later when it is brought to the House floor. The controversy surrounding this proposal is likely to block any final Senate-House compromise.

The House in fact moved in the other direction and adopted measures to protect the rights of U.S. workers which do not fit into the Senate's version. Farmers must provide workers who are U.S. citizens the same inducements they give foreign temporary workers, such as travel allowances to get to farms. Such protection, argues Rep. Howard Berman (D-Calif.), author of the proposal, is necessary to protect the rights of the unemployed Americans who would take the jobs if they

*Continued on next page*

## The Suburbs' "Urban Villages"

"Soulless glass and concrete shells, a devastating comedown from the warmth and color of traditional towns and cities." This is how columnist Neal R. Peirce describes the "urban villages"—huge office complexes-cum-shopping centers and hotels—which have infiltrated once placid suburban areas.

Peirce, a nationally syndicated columnist, is horrified by this phenomenon and wrote a series of columns, appearing last August and September, aimed at pointing out the perils of this "suburban horror show."

Corporate America is moving to the suburbs, creating stress on roads designed for half the traffic load, and on the environment as well as water and sewage systems. One of the greatest costs of this suburban explosion is every commuter's nightmare: Traffic (with a capital T). Peirce maintains that the large cities' greatest fear, gridlock, whereby an entire city's traffic comes to a standstill, could become reality in the urban villages. City street systems are based on a grid framework, providing multiple roads from which drivers can choose. If one street or intersection becomes clogged, frustrated travelers can escape via an alternative road.

In suburbs, however, affordable living is rarely found around office complexes. Often, distances between less pricey residential areas and the workplace are so great that freeways or super highways must be used. Because of poor planning there will often be only one road available to an office complex or shopping center. And when that road clogs, there is no escape.

*Continued on next page*

## FROM THE EDITOR'S DESK

*"And it came to pass in those days, that there went out a decree from Caesar Augustus, that all the world should be taxed..."* —Luke 2:1

"Taxed" is a broad way of translating "enumerated." For the event which begins the Christmas story was a census (with taxation and possible military service to follow, which might help explain people's coolness toward censuses in ancient times).

The method of counting people "each in his own city" is assumed to have been used across the Roman Empire, and made things easier for the census taker, if no one else. If carried out in the U.S., where 36 percent of the population does not even reside in the state they were born in, such a census would mean chaos. For the 800,000 largely nomadic people of Judea, it meant trudging to their family's city of origin to register and give name, rank, and occupation. But there was no way to sue the Census Bureau in those days.

Three censuses are known to have been taken during the reign of Caesar Augustus—in 28 B.C., 8 B.C., and A.D. 14. None of these quite jibes with over Gospel references, which suggest that Jesus was probably born between 6 B.C. and 4 B.C.

To confuse matters further, the Cyrenius mentioned in the second chapter of Luke was governor of Syria in both 6 B.C. and a later, unknown year. So what was the census of "all the world" of the Christmas story?

It may have been a late edition of the 8 B.C. enumeration; it may have been a later census by King Herod in the Roman manner. Scholars are still working it out, and all *PT* is trying to say here is (a) everything, even Christmas, has demographic aspects, if you look hard enough, and (2) Seasons Greetings!

*—Art Haupt*

### Immigration

*Continued from preceding page*

could get to them. His amendment would also make it illegal to use foreign temporary workers as strike breakers.

Thus, even though the House and Senate share the same goal of curbing the flow of illegal aliens into the U.S. by penalizing employers who knowingly hire illegal aliens, a compromise between the House and Senate conferees is unlikely, due to the Senate's guest worker clause. This puts added pressure on the House as it prepares to consider the subcommittee's version of the bill. Although efforts are underway to find some sort of compromise to the controversy by the end of the year, it is likely to be an arduous task. □

### Suburbia

*Continued from preceding page*

Another cause for alarm, Peirce writes, is the demise of the rush hour: traffic on suburban roads is no longer limited to the morning and evening hours in suburbs of many major urban areas (such as Houston, Dallas, Los Angeles-Orange County, and Long Island) and the trend is spreading. In addition, traffic congestion is fast losing its directional bias. No longer are the roads leading from the suburb to the city the only ones chock full of commuters; now there is no telling where a commuter might be headed.

Why has this unbridled growth been allowed to occur? Peirce blames the U.S.'s extraordinary lack of planning: "Probably no other nation in the world combines an exuberant economy with an aversion to planning." Moreover, he feels that big business is influencing town and county managers, convincing them not to restrict development.

Another dangerous consequence of this trend toward suburban work life is the "resegregation" of the work force. Peirce in fact likens it to South Africa's apartheid. He writes that the peripheral towns are overwhelmingly affluent and white. When the jobs are offered there, the lower income people, including a disproportionate number of minorities, are left out in the cold. He cites the case of the high-tech area west of Boston which had to bus in 1,200 jobless people from the Athol-Orange, Mass. area (closer to Boston) in order to meet the demand for Christmas-season department store clerks—a 100-mile daily commute.

The situation, though grim, is not hopeless, according to Peirce. If the corporations involved were forced by local ordinance or policy to provide the resources necessary to strengthen roads and road systems, to encourage car pooling and use of rapid transit, and to beautify the developments, at least part of the battle would be won. This would require state or local policies, hardly easy to attain, considering that developers often have great influence over town council actions. However, Peirce points to the cases of Florida and Massachusetts as models for the future.

In Florida, the state has passed a growth-management bill. It is now promising to fund roads, sewers and schools before, not after, new development is approved. Part of their concern is to protect fragile coastline and barrier islands. Massachusetts has no law, but it does have a policy: Gov. Michael Dukakis has striven to divert high-tech and service-economy expansion away from the growing corridors of Rt. 202 toward areas of high joblessness and underinvestment—with mixed success.

The suburbanization of the workplace, especially in its current state, has little to offer Peirce. He writes: "Goodbye, real streets or gutsy waterfronts or a place (heaven forbid) where someone might mount a soapbox and make a speech against Authority.... In time urban villages might become real people places. But for most of suburbia's instant cities, that's likely to be a long time coming." □

For information on obtaining Peirce's series of articles, write to *Population Today*, PRB, 777 14th St. N.W., Washington, D.C. 20005.

# PRB Had a Memorable 1985

As 1985 comes to a close, the office is in some disarray as the PRB staff prepares for a December move to new, more spacious quarters. But PRB staffers and members alike can look with satisfaction on PRB's accomplishments for the year.

Under the continued leadership of President Thomas W. Merrick, PRB has in the past year garnered, along with new office space in Washington's up-and-coming downtown, a new AID contract, a new logo, more microcomputers, and more staff members. Moreover, in 1986, all PRB publications will undergo an appearance overhaul: members can look forward to an updated "family" appearance for the publications.

Perhaps the year's most exciting event was the award of AID's Research Dissemination contract to PRB. Promptly dubbed IMPACT (Innovative Materials for Population Action), the project strives "to improve use of population information and research findings by policymakers in developing countries and the donor community." The five-person project team, headed by Elaine M. Murphy, who was PRB's Director of Population Education from 1978 to 1984, will accomplish its objectives through the production and targeted distribution of population-related publications, along with response to ad hoc requests and technical assistance to LDC institutions.

IMPACT offers PRB the opportunity to expand its use of computers, both for the production of high-quality graphics, and through the use of an IBM PC-AT with a laser jet printer and graphics equipment. In fact, 1985 saw a great deal of PRB's work transferred to computers. A growing majority of the staff can no longer function without their trusty micros.

On Oct. 24, PRB hosted its annual awards dinner in Washington, D.C. This year, Dorothy Nortman was honored for her many contributions to the field of demography, not the least of which is her well-known "Fact Book" on population and family planning programs (see Nov. *PT*). Those in attendance heard Virginia R. Allan, a member of the U.S. delegation to the UN Women's Conference last summer in Nairobi, recall her thoughts and impressions of the Conference.

PRB's name was well represented in the popular press in 1985. Along with ample press coverage of PRB's publications, PRB population experts were interviewed for and quoted in, among others, *Time* and *Money* magazines this year.

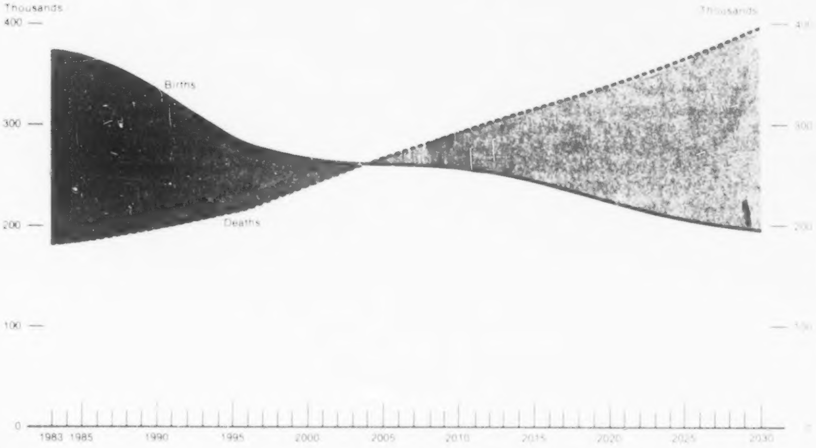
One PRB publication that received far and wide press coverage was *Who Cares? Demographic Trends Challenge Family Care for the Elderly*, part of PRB's Population Trends and Public Policy Series. This paper was written by Alice T. Day, PRB Visiting Scholar (sponsored by the Mellon Foundation) for 1984-1985. Shortly after completing the paper, Alice Day left PRB for her home in Australia, where she is now consultant to the National Bureau of Statistics.

In August, PRB welcomed Robert W. Gardner as the Visiting Scholar for 1985-1986. On leave from the East-West Population Institute in Honolulu, Gardner coauthored PRB's October *Bulletin* on Asian Americans (receiving wide press coverage) and is completing a related Census monograph. He will then resume his research on Asian immigration.

PRB's RAPID team (a subcontractor of the Futures Group's Resources for Awareness of Population Impacts in Development contract with AID) tracked the globe again in 1985. Vice President Leon F. Bouvier did demographic work in the Caribbean and Africa, while Thomas Goliber, who has officially joined PRB from the

*Continued on next page*

## SPEAKING GRAPHICALLY



**The above graph illustrates projected natural increase in Canada (see article, p. 6) under the assumption of low future fertility, an average of 1.4 children per woman. The left side of the "bow tie" indicates natural *increase* to about 2005 with annual births exceeding deaths while the right side illustrates natural *decrease*, the opposite situation.**

*Source:* Statistics Canada, *Population Projections for Canada, Provinces, and Territories, 1984-2006*, Ottawa, 1985.

**SURVEY REPORT**

## Botswana

Although Botswana's area of 232,000 sq. miles is a bit larger than that of France, the country's population of 1.1 million makes this southern African nation one of the continent's least densely populated. Only about 3 percent of the country's land is suitable for cultivation, with the rest semiarid or desert. Most of the population is settled in the more fertile eastern part of the country.

Mining has taken on increased importance in Botswana's economy in recent years, although farming and cattle raising are important activities. The country has now become one of the world's largest diamond exporters. Still, most Botswanans live in small settlements or rural areas; 82 percent of the population was classified as rural in the 1981 Census.

In 1984, the Botswana Family Health Division, in cooperation with Westinghouse Public Applied Systems, conducted the Botswana Family Health Survey (BFHS) to collect basic health and family planning data. Botswana's official policy is to reduce the population growth rate, and specific targets for family planning acceptors have been set.

The BFHS measured high levels of fertility, even higher than those reported in the census, a fact probably due to more probing questions in the survey. A total fertility rate (TFR) of 6.5 lifetime births per woman was reported. While this is a high level of fertility, it is not as high as rates in many less developed countries. The fact that women ages 45-49 surveyed reported 9 lifetime live births suggests that there has been some fertility decline in Botswana. Unlike some other sub-Saharan countries, infertility is not believed to be a factor in Botswana, ruling out disease as a cause for the fertility decline.

On average, surveyed women said that the number of children they expected to have was about 5.6. It is noteworthy, however, that the 15-19 year old respondents said that they "expected" to have only 3.9 children; that response was the same in both urban and rural areas. Attitudes on population size were also solicited, and 55 percent said they thought that there were too many people in the country.

Knowledge of contraception is quite high in Botswana. About three-fourths of the women had heard of a modern family planning method and virtually all of those approved of the idea generally. However, only one-third had ever used a modern method (with the pill predominating). Those who had used a traditional method, primarily abstinence, raised the total of contraceptors to about one-half of the sample.

Overall, Botswana has the second highest rate of women actually using family planning so far unveiled in continental sub-Saharan Africa. (Zimbabwe at 39 percent in late 1984 is highest.) Contraception was being practiced by 28 percent of the women in the sample who were currently in union; 19 percent of all such women in the sample were using a modern method (compared to 27 percent in Zimbabwe).

It appears that conditions in Botswana such as an effective government-supported family planning program, relatively high levels of education, and attitudes which perceive population growth as a national concern would favor a gradual decrease in fertility. However, expected family size is quite high, partners may often not approve of contraception, and sexual unions begin at an early age. To date, many family planning goals have been met or exceeded, but whether that record will be maintained remains to be seen. □

### PRB's Year

*Continued from preceding page*

Futures Group, has logged his share of kilometers, particularly in Africa.

Closer to home, PRB staffers trekked to Boston for the annual meeting of the Population Association of America, and PRB was well represented at the conference of the International Union for the Scientific Study of Population in Florence in June.

Once the PRB staff is happily ensconced in new quarters, they will look to the coming year. PRB's new membership schedule takes effect beginning in January 1986; all members at that time will begin receiving all of PRB's publications, which will sport PRB's "new look." Watch for a clean, modern look with a strong family appearance. 1986 promises to be a time of transition for PRB – the staff looks forward to new and exciting changes. □

## Canada's Population Future Projected

Slow growth from today's population of 25 million to about 30 million and then a gradual decline starting around 2026 – that is one possibility given by a new set of Canadian population projections just released by Statistics Canada. This scenario would prevail if Canada's total fertility rate (TFR) of 1.7 lifetime births per woman were to remain constant and net immigration amounted to 50,000 per year. (See graph on page 5.)

Another possibility given some credence by the report is that the TFR could fall to 1.4 and that Canada's population could "top out" at 28 million around 2016. Or the TFR could rise (to 2.2), producing a Canadian population of 38 million by 2031, and still growing; this latter option is only seen as a possibility if there were a "radical societal change in the outlook on life" in Canada.

As do all projections, the Canadian series also must make some assumptions about future immigration and life expectancy. On the former, Statistics Canada sees an immigration level of less than 100,000 unlikely given present trends in family-reunification immigration and world refugee problems. A second alternative is 150,000 per year should an improving economy produce a demand for additional labor force in the face of low fertility. From these figures must be subtracted 50,000 emigrants (estimated from family allowance and tax records).

The two assumptions on net immigration make some differences in the projections, forestalling the onset of population decline somewhat. Life expectancy is assumed to rise a bit faster for males than females, reaching about 75 for males in 1996 and 82 for females. □

*Population Projections for Canada, Provinces, and Territories 1984-2006*, prepared by M.V. George and J. Perreault, 1985, 346 pages, is available from Population Projections Section, Demography Division, Statistics Canada, Ottawa, K1A 0T7. Price: Can.$40.00 in Canada; Can.$50.00 all other countries.

# Populandia Patter

Populandia rose out of the Pacific Ocean eight years ago—and ever since, this mythical mini-continent has served as the repository of the world's natural increase (the "surplus" of births over deaths). Since then, too, PRB publications have kept readers up to date on the faraway island nation (most recently, in the December 1984 issue of *PT*).

Over a third of a million babies are born around the world each day and over 60 percent of them represent natural increase, the other 40 percent serving to replace people who have died during the same period. Populandia started out with one baby on Jan. 1, 1978, but because of this kind of growth its population did not stay small for very long.

As of Dec. 31, 1985, Populandia's population of youngsters, all born in the last eight years, stands at 621,470,421. Though it represents only the natural increase of the past eight years, this is a goodly number of people constituting about one-eighth of the world's total population—more populous than any countries except China and India, more people than any continent save Asia. It is more people than speak English and Arabic combined, more than are estimated to be Roman Catholic, and more people than existed on the planet in the year 1600. ☐

## 1990 Census

*Continued from page 2*

Of these, 23 are still active. They are mainly suits by cities and states charging that the results of the 1980 Census were invalid because of undercount. One major suit, filed by New York City and State, was tried twice and is now awaiting the judge's decision for the second trial, which was held in the Federal Court of the Southern District of New York.

The other pending 1980 undercount cases have been referred to the District Court in Baltimore for the purpose of pretrial proceedings, though when and where those cases will go to trial is uncertain.

In 1970 no significant lawsuits clouded the Census Bureau's horizon. The avalanche of litigation from states and cities involving the 1980 Census correlates pretty directly to the increase in federal programs that use population figures in their formulas for disbursing funds. So far, the Census Bureau has dodged the litigious bullet, and Census figures remain as is, with no adjustment for population.

Should the Bureau lose any undercount case, the situation would change drastically. In order for the decennial census to continue as the basis for apportionment, the problem would probably be passed on to Congress, which would have the unenviable task of agreeing on and writing into law a Constitutionally unobjectionable bill providing for some undercount-adjustment formula or other.

Will 1990 mean more lawsuits, more enumeree paranoia? No one knows. All the Bureau of the Census can do is continue working on keeping costs down and confidentiality and convenience up. And it has to keep beating the public relations drum to try to convince the nation's 240-million-odd residents of the seemingly self-evident truth that America's once-a-decade family "snapshot" is taken to help, not threaten. ☐

# Population Update

Estimated United States Population:

| | |
|---|---|
| As of July 1, 1985 | 238,816,000 |
| As of July 1, 1984 | 236,681,000 |

**The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports,* Series P-25, No. 977.**

Estimated World Population:

| | |
|---|---|
| As of December 1985 | 4,880,000,000 |
| Annual Growth | 82,000,000 |

**Estimated by extrapolation of the mid-1985 world population given on PRB's 1985 World Population Data Sheet.**

### Latest Provisional Statistics for the U.S.: July 1985

| Item | 12 months ending with July | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,738,000 | 3,639,000 | 15.7 | 15.5 | 15.8 | 16.0 |
| Deaths | 2,082,000 | 2,027,000 | 8.8 | 8.6 | 8.6 | 8.5 |
| Natural increase | 1,656,000 | 1,612,000 | 6.9 | 6.9 | 7.2 | 7.5 |
| Marriages | 2,456,000 | 2,456,000 | 10.3 | 10.4 | 10.5 | 10.6 |
| Divorces | 1,176,000 | 1,167,000 | 5.0 | 5.0 | 5.0 | 5.2 |
| Infant deaths | 39,400 | 39,100 | 10.5 | 10.7 | 11.0 | 11.3 |
| Population base (in millions) | ... | ... | 237.5 | 235.0 | 232.9 | 230.7 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

*Source. Monthly Vital Statistics Report* (Vol. 34, No. 7) from the National Center for Health Statistics.

# DEMOGRAPHER'S

## Questionable Statistics

by John G. Keane

*This article originally appeared in American Demographics, June 1985, and is reprinted by permission from the author and from American Demographics, P.O. Box 68, Ithaca, N.Y. 14851, subscriptions $48 per year.*

Despite centuries of statistical evolution, burgeoning computer technology, and an expanding educational emphasis on quantitative methods, people frequently abuse statistics. This abuse misleads an unwary public, and it takes many forms, the most common of which I review here in an effort to promote statistical literacy.

### Averaging, Not Adding

A few years ago someone observed that, because two counties had a 10 percent and 13 percent minority share in their respective populations, then the Census Bureau's work force—at 13.2 percent minority—was far below the 23 percent required for proportional representation.

But the observer made a mistake. He added the county percentages together when he should have taken the weighted average of the minority shares of the two counties. Had he calculated correctly, he would have discovered that the minority share of the Census Bureau's work force exceeded the proportional representation.

This type of statistical error occurs with some frequency. A few months ago, for example, a dress shop advertised a sale with huge banners announcing:

10 percent off the first dress
15 percent off the second
Total savings—25 percent!

These statistics might have made some shoppers happy, believing that they were saving 25 percent when they bought two dresses. Shoppers with a rudimentary knowledge of statistics, however, knew they would save less than 15 percent.

**Table 1: Frequency Fixation**

**Percent change in real GNP**

| year/quarter | flash | revised | difference |
|---|---|---|---|
| 1984 | | | |
| 4 | 2.8 | 3.9 | +1.1 |
| 3 | 3.6 | 1.6 | −2.0 |
| 2 | 5.7 | 7.1 | +1.4 |
| 1 | 7.2 | 10.1 | +2.9 |
| 1983 | | | |
| 4 | 4.5 | 5.9 | +1.4 |
| 3 | 7.0 | 6.8 | −0.2 |
| 2 | 6.6 | 9.4 | +2.8 |
| 1 | 4.0 | 3.3 | −0.7 |
| 1982 | | | |
| 4 | −2.2 | −1.3 | +0.9 |
| 3 | 1.5 | −1.0 | −2.5 |
| 2 | 0.6 | 1.0 | +0.4 |
| 1 | −4.5 | −5.5 | −1.0 |
| 1981 | | | |
| 4 | −5.4 | −5.3 | +0.1 |
| 3 | −0.5 | 2.2 | +2.7 |
| 2 | 0.0 | −1.5 | −1.5 |
| 1 | 5.5 | 7.9 | +2.4 |

*Note.* These changes are seasonally adjusted, and given at annual rates.
*Source.* Bureau of Economic Analysis.

### Dated Numbers

Between 1970 and 1980, there was a statistically significant decline in average household size, from 3.11 to 2.75 persons per household. This decline took many local officials by surprise. Since 1970, some of them had been estimating their local populations by taking the 1970 census count of housing, adding new housing starts, subtracting demolitions, and multiplying by the 1970 average household size. To the distress of many, the 1980 census count of the local population was much lower than they had estimated because of the decline in average household size. Local officials learned anew the risk of using dated statistics.

### Frequency Fixation

At the other extreme is the fixation of the business world on the frequency of numbers rather than on their quality. There is a trade-off between quality and frequency—particularly when it comes to producing weekly numbers. Would an improvement in quality be worth a less frequent production schedule?

Businesses eagerly await preliminary key economic statistics—such as weekly money supply figures and quarterly GNP ("flash") estimates. But some businesses take these statistics too literally, not understanding the limitations of preliminary figures, despite the efforts of statistical agencies to educate users about the shortcomings of such statistics.

Not infrequently, revised numbers are substantially different from preliminary estimates—so different, in fact, that had a business waited for the revised number, it would have acted differently than it did based on the preliminary figure. Table 1 shows how far apart the preliminary and revised estimates of GNP can be. Note, too, that the flash estimates are not getting any better at predicting the final estimate.

Some users argue that only the direction of change is important, not the degree. As long as the direction of change indicated by the flash estimate is confirmed by the revised estimate, then any decisions a business makes based on the flash estimate will be correct. But this assumption could lead them astray, because even relatively small percentage changes translate into huge absolute amounts of dollars, goods, or workers. A 0.5 percent difference in the employment level, for example, translates into about half a million jobs.

### Income Headlines

Table 2 illustrates how income statistics can be interpreted in a variety of ways. Though the statistics are the same, the way that they are presented virtually dictates their message.

By examining absolute growth in per capita income for whites and

# PAGE

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**Table 2: Alternative Newspaper Headlines**

| | Per capita income (dollars) 1969 | 1979 | difference |
|---|---|---|---|
| **White Per Capita Income Grows More Than Black!** | | | |
| black | 3,566 | 4,545 | +979 |
| white | 6,522 | 7,808 | +1,286 |
| **Black Per Capita Income Grows More Than White!** | | | |
| black | 3,566 | 4,545 | +27% |
| white | 6,522 | 7,808 | +20% |
| **Little Change in Black/White Income!** | | | |
| blackffiwhite ratio | 55% | 58% | +3% |

*Note.* All in constant 1979 dollars.

blacks, it appears that white income grew more between 1969 and 1979. By comparing the percentage change, it appears that black income grew more. And by examining the change in the relative proportion of black to white income, there appears to be little difference between 1969 and 1979. To paraphrase the late Marshall McLuhan — the format is the message.

The headlines in Table 2 offer three contrasting interpretations of income statistics. Which headline you prefer might well hinge on your current agenda, and so it is with headline writers. But income statistics carry too much economic importance and too many political overtones to be handled carelessly.

## Goods Versus Dollars

A recent newspaper headline read, "Cigarette Industry Grows." The copy asserted that "the value of products produced by the cigarette industry in 1982 was nearly double that of 1977, the Census Bureau reported Tuesday." The facts are true enough, but the headline — "Cigarette Industry Grows" — was not the conclusion reached in the Census Bureau's official press release. In fact, in physical units — the number of cigarettes sold — the cigarette industry declined from 1977 to 1982. Again, it was the headline writer who decided whether the cigarette industry had grown or declined.

## Business Hyperbole

Newspaper and magazine writers sometimes get carried away with statistics.

The host of "Wall Street Week" on public television (Dec. 7, 1984) declared that unemployment took a "steep decline" in November 1984, from 7.4 percent to 7.2 percent. To call an 0.2 percent drop in unemployment a "steep decline" considerably overstates the case, particularly when this drop merely extended a decline that had been going on for 11 months.

"Sales of new single-family houses rose a sharp 3.1 percent (in December 1984), setting an annual pace of 606,000 sales," asserted an article in *USA Today* (Feb. 1, 1985, p. B1). It is an overstatement to call a 3.1 percent (18,000 houses) advance "sharp" when there were even larger sales increases or decreases in every other month in 1984 except one, and the December figure is only accurate to within plus or minus 5 percent (30,000 houses).

In fact, it is well known that the new home sales statistical series is erratic and sales increases or decreases of 10 to 20 percent are not uncommon. In its press releases the Census Bureau stresses that — "Month-to-month changes in seasonally adjusted statistics often show irregular movement. It takes four months to establish a trend for new home sales."

The *Wall Street Journal* described a 2.3 percent decline in the futures market crude oil price as a "plunge." ("Crude-Oil Prices Unlikely to Rise Soon Due to Mild Winter and Strife in OPEC," *Wall Street Journal,* Jan. 7, 1985, p. 39.) What words would the writer use to describe a 23 percent decline, if that were to occur? What adjective would be powerful enough to describe the stock market crash of 1929?

When you examine changes in business statistics — or any statistics — you must consider the context of the change before you judge whether there has been a surge or a plunge. This kind of hyperbole can cause business decision makers to overreact to statistics. The resulting business decisions, taken collectively, may magnify rather than modify short-term fluctuations in the economy. Businesses should use short-term economic statistics to continually readjust their perspective on the longer-term trends rather than to chart dramatic shifts in course.

*Continued on next page*

**Table 3**
**Sources of Nonsampling Error**

Setting Objectives:
- errors in translating the sponsor's problem into operational objectives for a survey or census

Sample Design:
- population list errors
- errors in implementing the sampling scheme

Measurement Process:
- office staff errors
- field staff errors
- respondent errors
- noninterviews/missing data
- preprocessing errors

Estimation Procedure:
- estimating equation errors
- computer programming errors in implementing estimating equations
- faulty editing routines
- machine errors

Survey Report:
- errors in transcribing or publishing computer output
- errors in interpretation of survey results

User Errors:
- inferring to same population at a different point in time
- inferring to different population or subpopulation
- inferring to an underlying concept (for example, failure to measure what is intended)
- data analyses errors

## Demographer's Page

*Continued from preceding page*

### Political Polls

Though reputable pollsters contend that their polls should not be used as projections or forecasts, these admonitions often go unheeded during the heat of a campaign. Unfortunately, this frequently and unfairly discredits the credible pollsters whose disclaimers are ignored.

The public's lack of knowledge about survey methods is behind much of the misinterpretation of polling data. The media are often unfamiliar with the limitations of polls, and they do not concern themselves with survey design, conduct, and interpretation. The public, in defense, should ask:

- When did the poll occur? (Did outside events affect the results?)
- In comparing numbers from several polls: Were the polls taken at the same time? Were the respondents chosen in the same way? Were the sample sizes considerably different? Were the respondents asked questions in a different way? Was one poll taken by personal interview and another by telephone?
- Are the interpreters of the polls ignoring sampling error in their conclusions? Do they confuse "percentage points" with "percentages" when referring to the ranges of sampling error? (Frequently this is the case.)

### Spurious Accuracy

It is also an abuse to be statistically but misleadingly precise. Examples abound: A city declares that its streets are 85 percent cleaner than they were a few years ago; a Battelle Laboratories study projects that undetected counterfeit money will amount to $16.3 million a year by 1992[2]; survey researchers present column after column of responses rounded to the nearest hundredth of a percentile. Is our increasing dependence on quantitative methods producing this pseudo-science?

### Nonsampling Error

In statistical reporting, most researchers pay attention to sampling error, a tidier concept than nonsampling error because it is easier to measure. Table 3 shows the many ways that nonsampling error can creep into statistical results, ranging from errors in the way respondents are interviewed to errors in interpreting results. Researchers should define—or better yet, measure—the sources of nonsampling error to strengthen their survey results.

### Misleading Charts

Tables and charts should be carefully designed to present information clearly. Poor scaling as well as confusing, incorrect or illegible labeling and too much "junk" on a chart all can mislead the statistics user.

To make a good statistical presentation, follow the prescription of Howard Wainer who writes in *American Statistician:* "Examine the data carefully enough to know what they have to say, and then let them say it with a minimum of adornment."[3] Unfortunately, many people do not know how to listen to statistics.

### Carelessness

Then there is plain, old-fashioned carelessness. It takes a variety of forms—accidentally transposing numbers, not checking facts, overreliance on secondary sources of information. In this age of newspaper syndication, for example, when carelessness results in factual misstatement, it is virtually impossible to obtain a syndication-wide correction. The moral is—be careful.

### Any Port in a Storm

The reasons for statistical abuse range from ignorance to arrogance. Sharing the blame, however, is the "give me any numbers you have" mentality of some statistics users who are willing to sacrifice accuracy for immediacy. When quality is questionable, however, any numbers are not superior to no numbers.

"More so than any other people in the world, Americans are data junkies," observes author Ben J. Wattenberg.[4] In many respects, he is correct. This is just another reason to treat statistics carefully.

Now is the time to renew statistical literacy. Advances in computers, software, and quantitative methods cannot substitute for user knowledge of statistics. Perhaps it was this sentiment that prompted the 19th century Prussian mathematician, Leopold Kronecker, to assert, "God made integers, all else is the work of man."[5]

As the work of man, the discipline of statistics offers enormous opportunities, because it crosses social, economic, political, and geographic boundaries. Statistics are a quantitative Esperanto. Correctly crafted, statistics are a boon, not a burden, to decision making. Correctly interpreted and presented, statistics are a useful investment, not a useless cost, to their sponsors. ☐

#### References

1. *USA Today,* Dec. 14, 1983.
2. *Parade,* Jan. 13, 1985.
3. *The American Statistician,* May 1984.
4. B. Wattenberg, *The Good News Is the Bad News Is Wrong.* New York: Simon & Schuster, 1984, p. 132.
5. H. Weber, "Leopold Kronecker," Report of the German Mathematicians Association in 1886. Berlin: Georg Reimer., 1893. Book 2, page 19.

## SOFTWHERE

MALTHUS is an educational software unit consisting of the program MALTH, a mathematical model which follows a simple Malthusian framework. It enables the user to subject exponential population growth to the constraints of food supplies limited by the law of diminishing returns and the availability of resources such as oil and cultivable land. Using variables such as the birth rate, death rate, and oil reserves, the population is projected to the year 2275. The model can also be used to "predict" the past by using values for the year 1900.

This unit is designed for use with students aged 15 years plus, and was produced by the Computers in the Curriculum Project at Chelsea College.

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Population Today

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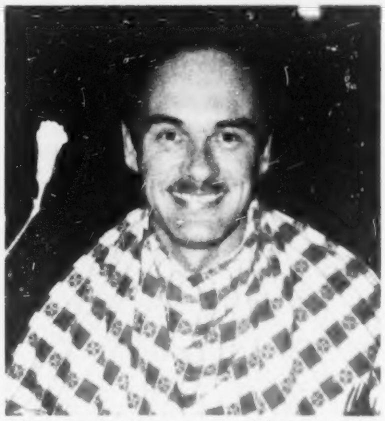

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## TAKE A NUMBER . . .

**Hindsight**: In 1970, PRB published a speech of George Brown, then Census Bureau Director. Mr. Brown looked ahead to 1985, prognosticating on our future demographics. How well did he do? All in all, not badly. The 1985 U.S. population was projected to be between 240 and 250 million. Although it in fact has reached only 238 million, that was a reasonable projection, considering that women's birth expectations were for 3 children apiece in 1970. Brown did allude to the fact that fertility could drop lower than any 1970 data might suggest.

Brown was a bit further off in predicting migration, indicating that some eastern states such as Connecticut, New Jersey, and Maryland would be major magnets. He did correctly point to California, Arizona, and Florida as growth areas, but omitted Texas; it is interesting today to note that the term "Sun Belt" does not appear in the speech, nor does "baby bust." Another bit of prescience: Brown alludes to more rapid growth in nonmetropolitan counties in the future and the slowdown in the growth of big city populations.

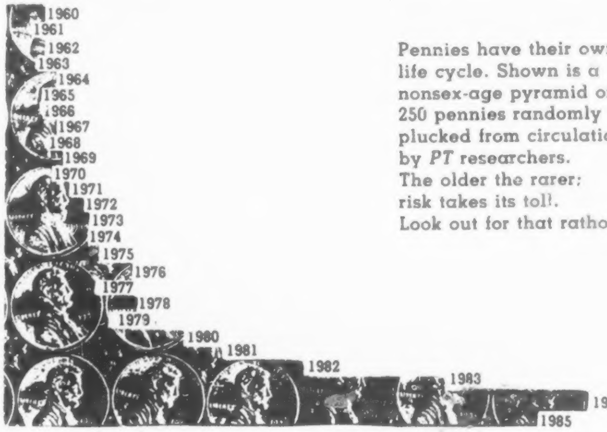
**Population Bulletin:** It can now be told: that the world population figure for 1971, 3,745,635,221, is incorrect. This disturbing news comes to us via Jean van der Tak, PRB's *Population Bulletin* editor. Jean's family, it seems, was living in the USA in 1970 and was duly counted in the 1970 Census, we are happy to report.

However, the good news stops right there. Jean, when pressed, admitted that she was not living in the USA in 1971 but in the Netherlands. She was also counted in the 1971 Dutch Census and the figures were duly cranked into the population count of *that* country, then into the Western Europe figure, from there into the Europe total, and (you know the rest) right smack into the world total. To make matters worse, the error is actually *five,* since that was the size of Jean's family. Was that five ever subtracted from the 1970 USA figure? You'd better believe it wasn't.

This little enumerative slip has wrought statistical havoc. As a service to our readers, a special squad of PRB demographers is now busily recalculating all known rates. The first preliminary results show that the world crude birth rate in 1971 was *not* 33.8658198 per 1,000 as we all thought, but in truth was 33.8658199 (or 3.386581986E01 for you deep thinkers).

Our bone-weary Reevaluation Team will stay on the job until all true rates for 1971 are known. Who says that individual people can't affect world-class rates? Shame on you, Jean. . . .

## . . . addenda



**Pennies have their own life cycle. Shown is a nonsex-age pyramid of 250 pennies randomly plucked from circulation by *PT* researchers. The older the rarer: risk takes its toll. Look out for that rathole!**

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

**ABORTION: Moral and Legal Perspectives, edited by Jay L. Garfield and Patricia Hennessey. Amherst, Mass.: University of Massachusetts Press, 1984. 384 pages. $13.95, paper. ISBN 0-87023-440-4.**

When, in 1973, the Supreme Court ruled that all existing laws limiting the availability of abortion violated a woman's right to privacy and were therefore unconstitutional, it certainly did not close the book on the abortion debate. The decision left open a plethora of complex issues surrounding abortion. These issues stretch well beyond the question of prolife vs. prochoice.

This compilation of essays addresses many of the philosophical and legal problems which arise in any comprehensive discussion of abortion. Areas explored include the all-pervasive question of personhood, and of the relationship between law and morality (Is abortion a question of privacy or murder?). In addition, the nature of the abortion act itself, i.e., whether it is an act of killing or of passively letting die, is discussed.

The essays are thoughtful and thought-provoking, and present an array of perspectives. This book approaches abortion as a philosophical subject worthy of scholarly thought. In his introduction, editor Jay L. Garfield writes, "[the issue of abortion] requires careful scholarly examination of the fundamental moral and legal questions into which the issue resolves." This work represents one such examination, and is a valuable addition to the post *Roe v. Wade* literature.

*—Janine Adams*

**AT ANY COST: Corporate Greed, Women, and the Dalkon Shield, by Morton Mintz. New York: Pantheon, 1985. 308 pages. $17.95. ISBN 0-394-54846-9.**

This book by a prize-winning *Washington Post* investigative reporter documents a chilling tale of corporate irresponsibility that led to a catastrophe "without precedent in the annals of medicine and law."

From 1971 to 1975 the huge, U.S.-based pharmaceutical firm of A.H. Robins, makers of Robitussin cough syrup and Chapstick lip balm, sold 2.8 million Dalkon Shield IUDs in the U.S. and another 1.7 million in 79 other countries. Because the multifilament nylon tail of Robins's Shield wicked bacteria from the vagina to the uterus, unlike the monofilament tails of other IUDs, tens of thousands of women suffered pelvic inflammatory disease, often leading to sterility and at least 20 deaths.

Some 5 percent of women became pregnant with the spike-edged Shield in place—nearly five times the rate claimed by Robins—and most miscarried or gave birth prematurely to defective babies.

So far Robins and its insurer have paid almost $500 million in claims and legal expenses to settle some 9,200 Shield lawsuits; over 5,000 cases remain pending. In August 1985 Robins filed for bankruptcy in a move to suspend lawsuits for at least one year.

Mintz describes in conscientious, gripping detail how Robins invited disaster. In relentless pursuit of profit, the company failed to test the Shield for safety, suppressed "unfavorable data," ran deliberately misleading advertising, destroyed telltale documents, intimidated women giving evidence in court, and delayed until October 1984 (10 years after the Shield had been taken off the market) a campaign to urge women still wearing the device to have it removed. "Corporate irresponsibility at its meanest" was how a U.S. District Court judge summed it up.

*—Jean van der Tak*

**DARK HARVEST, by Brent Ashabranner. Photographs by Paul Conklin. New York: Dodd, Mead, 1985. 150 pages. $14.95. ISBN 0-396-08624-1.**

Migrant farmworkers play an indispensable role in harvesting the fruits and vegetables produced by U. S. agriculture. By almost any measure, the people who gather our food are also our most depressed workers. *Dark Harvest* presents an informative and very readable story of the more than one million men, women and children who each year follow the crops, from broccoli and cucumbers to peaches and apples, to perform tasks that require human hands rather than machines.

Many of our farmworkers have homes in California, Florida, and Texas; others are part of the complex process of legal and illegal migration from Mexico and the Caribbean. They spend much of the year, from April through November, on the road. Their daily existence and chances to earn a living are plagued by poor housing and sanitation, risk of accidents, exposure to pesticides, uncertain weather, and exploitative crew leaders. While the majority of farm laborers are unattached males, a significant proportion of the work is done by families who work as a unit. For children, many of whom are working in the fields at age four or five, the toll in lost education and pesticide poisoning is particularly heavy. Head Start and programs organized by the churches have done much to ameliorate the conditions of migrant worker children.

Author Brent Ashabranner and photographer Paul Conklin portray farmworkers through interviews and pictures, combining vignettes of individuals and families in the migrant labor process with useful factual data about their lives, problems, and the institutions that affect them. The book is ideal for courses on social and public policy and interesting reading for anyone who wants to be informed about this important issue.

*—Thomas W. Merrick*

## PUBLICATIONS RECEIVED

**ALONE—NOT LONELY:** Independent Living for Women over Fifty, by Jane Seskin. Washington: American Association of Retired Persons, 1985. 229 pages. $6.95.

**COUNTRIES OF THE WORLD AND THEIR LEADERS YEARBOOK 1985:** Supplement. Detroit: Gale Research, 1985. 412 pages. $50.00.

**HISTORICAL ATLAS OF AFRICA,** edited by J.F. Ajayi et al. New York: Cambridge University Press. 1985. $75.00.

**LIBERIA: A Country Study,** by The American University, Foreign Area Studies, Washington, D.C.: U.S. GPO, 1984. 342 pages. $12.00.

**POPULATION INFORMATION IN TWENTIETH CENTURY CENSUS VOLUMES: 1900-1940,** by Suzanne Schulze. Phoenix: Oryx Press, 1985. 274 pages. $74.50.

**TARGETS FOR HEALTH FOR ALL,** by the World Health Organization, Regional Office for Europe. Copenhagen, Denmark. 200 pages.

# SPOTLIGHT

## SOUTH AFRICA

Population (1985 est.): 32.5 million
Land area: 471,400 sq. miles
Births per 1,000 pop. (1983): 35
Deaths per 1,000 pop. (1983): 14
Rate of natural increase: 2.1 percent
Total fertility rate: 5.1
Infant mortality rate: 92 infant deaths per 1,000 live births
Life expectancy at birth: 56 years
Exports: Gold, diamonds, minerals, agricultural products
Imports: Manufacturing equipment industrial raw materials
Capital: Pretoria

**by Jerry Judy**

A nation divided. This current and historical description of the Republic of South Africa holds equally for its population. Summaries of the population as a whole, such as those given above, often fail to reveal the many sharp differences which may greatly affect the future.

The population characteristic that dominates South Africa is its great racial, linguistic, and cultural heterogeneity. The Dutch East India Company established a supply station at Cape Town in 1652 for its ships carrying riches from the East. There were soon conflicts with the nomadic Hottentots and San (Bushmen). The British established permanent colonial control in 1806. Active campaigns attempting to Anglicize the Boers who had developed a separate identity and language, along with conflicts with blacks, set the stage for the Great Trek of Boer farming folk into the northern parts of the country between 1834 and 1838. Conflicts between the independence-minded Boers, the British, and black peoples created a pattern of racial attitudes, warfare and political struggle which continues to the present.

Since the elections of 1948, the government has given statutory force to the traditional South African practices of segregation and racial superiority. This practice of racial separateness argues that every race has a unique destiny and a cultural contribution to make. Races must therefore be kept separate so as to be allowed to develop on their own. This means even different black ethnic groups should as far as possible be kept separate from one another. Within the white group the idea of an exclusive community of true Afrikaners which should be preserved from contamination by English language and culture remains significant.

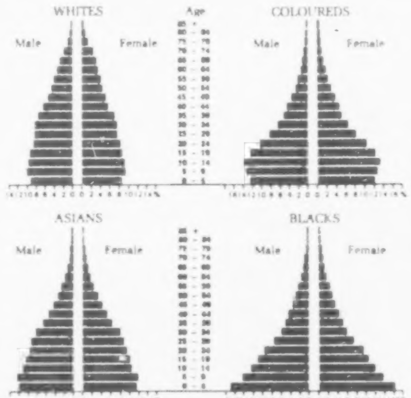
According to the 1980 Census, the proportion of the four broad groups making up the population are: 1) Blacks—Bantu-speaking peoples who fall into at least ten distinctive ethnic groups (68 percent); 2) Whites—descendants of mainly Dutch, English, French Huguenot, and German settlers (18.2 percent); 3) Coloureds—the persons of mixed race with whites, slaves from the East, Hottentot tribes, and blacks providing their ancestry (10.5 percent); and 4) Asians, mainly of Indian origin (3.3 percent). There are many recognized divisions within each of these groups.

The census counted a total of 24.9 million persons. However, these figures did not include several million blacks who were defined as belonging to independent Bantu Homelands or nations. These "nations" are recognized by no countries other than South Africa, but they do provide a justification for denying normal civil rights to blacks because these persons are defined as having an alien nationality. This allows discrimination to be based less on explicit racism and more on an "alien" status.

Despite population removals and distortions created by the census, the percentage of the total population who are white has decreased by about 5 percent since 1946, while the black population has increased by almost an equal amount. The gap is due mainly to higher fertility for blacks. In 1980 the total fertility rate for whites was below the replacement level. The TFR for blacks is estimated to have declined from 6.6 in the sixties, but was still 5.2 in 1980. Any increases for whites will depend mainly on immigration. Blacks are likely to be allowed to enter the country only as temporary workers.

The President's Council, an important advisory body of the government, issued a sobering report on the demographic trends in the country in 1983. With a doubling time of only 33 years, South Africa falls squarely in the category of less developed countries. Thus the government considers the rates of natural increase, population growth, and fertility to be unsatisfactory because they are too high. At the same time immigration from European countries is encouraged. More than 2 million people have been resettled in remote areas of the country to decelerate the growth of cities. Given the divisions within South Africa, any program designed or sponsored by government will probably have a credibility problem.

This *Spotlight* was prepared by Jerry Judy who is a visiting professor at PRB from Shippensburg University.



# POPULATION TODAY

Vol. 14, No. 1 January 1986

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Philippine Embassy

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# FROM THE EDITOR'S DESK

*The population are Asian? A number of the population is Asian? The largest percentage of the country are Asian?---*

Surely, demography, of all fields, should be ultra-sensitive to grammatical number. Yet some population-related words (called collective nouns, or nouns of multitude) are tricky rascals. When are they singular? When are they plural? And is there a gray area in between?

*Rule 1* – Collective nouns (a *fleet* of ships, a galaxy of demographers) are *usually* singular, but can also be plural. It depends on whether you're emphasizing a single entity or the individuals that constitute it. This powerful rule can be a license to kill, so use it with respect. But it does help in making sense of the following grammatical situations: *The managerial group was made up of businesspeople; the managerial group are putting on their raincoats.*

In demography the watchword is *population.* It's usually singular, because populations are considered mostly as single entities and raincoat donning is seldom discussed. Thus: *The population is largely Asian.*

*Rule 2* – Remember the adage: "the number was, a number were." This formula works for both the word *number* and for similar words, like *percentage.* As in: *The number of Asians was high; a number of Indians were included; the percentage of Pakistanis was relatively low.* "A number of" can be thought of as being synonymous with the adjective "numerous," with the singular or plural question decided by the noun so modified (e.g., by the Indians mentioned above).

*Rule 3* – For numerical percents and proportions, follow Rule 1 above, i.e., use either singular or plural as appropriate – but remain wary. *28 percent of the sample is Russian; 30 percent of the sample are infants; three-fourths of the population is under 60 years of age; half of the sample are projected to put on their raincoats.*

*Rule 4* – A rate is singular, even when it's full of numbers. *Some 20 deaths per 1,000 is the average in that part of the world.*

*Rule 5* – In grammar as in life, there's no reason to obsess; not even Ted Williams batted 1,000. Just try to make it halfway logical, or at least "sound right" when said aloud. If cornered about grammatical number by a persnickerty Ms. Thistlebottom as to a noun's plural-ness, feel free to say, "Why, I was following the rule on collective nouns right out of *Words into Type* (3rd ed., page 354)." And if totally cornered, throw in the ultimate grammatical excuse: "And, after all, it's a living language."

* * * *

Does History progress, or is life a Sisyphean process? Something to ponder. But one unquestionable improvement in the human lot during the late 20th century has been the revolution in graphic design. Let's face it, many publications used to be on the homely side (though in all fairness *PT*'s predecessor *Intercom* looked like a dream compared to say, the old *Boston Herald*). Furthermore, the graphics "ante" goes up every day (forget *Vanity Fair* and take a look at how slick *Fire House* magazine is).

In line with this trend, starting in 1986 all PRB publications incorporate a new, familial "look" – graphic specs designed by Morris, Hyson, Ferretti, and Gasper, who created PRB's monogram logo. Thus, the new clothes that *PT* is wearing this month. Our revamped appearance is designed to be more picturesque, spacious, and inviting. We hope you like it.

*— Art Haupt*

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# Halley's Other Comet

On Feb. 9, 1986, a dirty, streaking snowball 3 miles (5 km) in diameter will make a tight U-turn around the sun and head outward again, the dust-swirled vapor boiling off its surface painting a sunshot streamer across the inner Solar System.

Although only alert binocular-wielders may have been able to spot the cosmic visitor in the evening sky during its long fall, by March it will be visible to billions of people, low in the early morning sky as it climbs away from the sun. The diaphanous tail may (or may not) be faintly visible across one-sixth of the sky before it shortens and dims with distance and late next spring finally disappears – for another 76 years.

The object, of course, is Comet Halley (rhymes with tally), the superstar of comets, now making its 29th recorded visit to the inner Solar System. Among other things, the comet's return periodically redresses the neglect of English astronomer Edmond Halley (1656-1742), a relatively unsung contemporary of Isaac Newton whose curiosity and experimentation enriched many branches of science – including demography.

Halley, in fact, almost casually helped invent social statistics. The history of science has been the history of data quantification and analysis, and little by little this has been applied to the social sciences.

> 'Above all things,' Halley wrote, 'celibacy should be discouraged, as by extraordinary taxing and military service . . .'

In the 17th century, the only available demographic data were bills of mortality – weekly statements listing deaths and their causes. Londoner John Graunt, a member of the Royal Society and a demographic pioneer, used these bills to study causes of death and population trends. Another investigator, William Petty, organized a social survey of Ireland. Halley knew of these men's work. In 1692 the Society obtained a set of mortality bills from the town of Breslau in Germany – reports which listed the age and sex of all persons who had died there from 1687 through 1691.

The Breslau data were notable for their thoroughness, and Halley set out to apply his mathematical skills to analyzing the city's mortality patterns. What he came up with was a table of "an Estimate of the Ages of the whole People of that City, and thereby shewing the proportion of Mortality in each age, and a rule to estimate how long any person may reasonably be supposed to live."

## Halley's Demographic Comet

Subsequent scholars have questioned the details of Halley's methods. But in essence his Breslau analysis constitutes the first life table – a simulation of the lifetime mortality experience of a population. While earlier pioneers had taken a shot at gauging life expectancy of individuals, Halley was first to use death statistics in different age groups to calculate a person's chances of dying as he passed through each age group. He also endeavored (with mixed success) to calculate back to the fertility and population trends of the population.

Today, the life table is one of the foundations of demographic analysis. But even in the 17th century, the life table was no mere academic exercise. Life insurance and annuities had already been around for centuries, but the setting of premiums and benefits was very

*Continued on page 10*

# Housing to Go Upscale in 1990s

The baby boomers are destined to do it again. The giant generation that boomed the sales of diapers in the 1950s, soft drinks and records in the 1960s, and designer jeans and condominiums in the 1970s will be the salvation of the housing industry over the next decade, say urban planners George Sternlieb and James W. Hughes in PRB's *Bulletin* for January, "Demographics and Housing in America."

Because the household-formation ages of 18 to 34 are being taken over by the baby bust generation, born as fertility declined from the mid-1960s to the mid-1970s, the housing industry is facing an inevitable falloff in the total demand for housing and especially for "entry-level" housing. But this will be offset by the middle-aging of the baby boomers, say Sternlieb and Hughes.

By 1995 most of this powerful generation, born from 1947 to 1964, will be in the peak-earning, high-homeownership, and highly marital and familial ages of 35 to 54. As a result, predict Sternlieb and Hughes, steady growth in real median family income – not seen since 1973 – will resume. Married-couple households, which dropped from 74 percent of all American households in 1960 to 58 percent in 1985, will make a comeback. And the housing industry will flourish as family-oriented, repeat homebuyers seek upscale dwellings with all the high-tech trimmings, most likely in the suburbs.

The baby boom generation has been reshaping housing markets since its birth, say Sternlieb, who is director of the Center for Urban Policy Research at Rutgers University, and Hughes, chair of Rutgers' Department of Urban Planning and Policy Development. Tract-house suburbia was born in response to the family-building needs of parents in the "nesting" generation. Bolstered by the unbroken postwar prosperity that lasted to the early 1970s, new housing starts averaged 1.5 million a year in the 1950s and 1960s.

HUD photo

The babyboomers' middle-aging will boost demand for single-family detached homes in the 1990s

The baby boom generation's arrival at the household-formation ages touched off the "Golden Housing Age" of the 1970s. Total numbers of households increased by an average 1.7 million a year, compared to 1.1 million per year in the 1960s. Altogether a record 19 million year-round dwellings were added to the nation's housing stock from 1970 to 1980. New housing starts topped 2 million in some years, though with a plummet during the recession of 1974-1975. Real median family income declined after 1973 and inflation escalated housing costs, but inflation also fueled the demand for homeownership as an investment hedge. Half a million renter households were added each year.

> 'More fertile with income than with offspring [the baby boomers] will edge the housing market further upscale.'

The swinging singles and "mingles" life styles of the youthful baby boomers put condominiums, two-master-bedroom-suite luxury apartments, and two-bedroom townhouses into the market. Now the baby boomers' maturing into their familial middle years promises a return to more conventional single-family detached houses – "America's home of choice" – say Sternlieb and Hughes.

Housing starts and net gains in households plunged to barely a million a year during the deep recession of 1980-1982, they point out. But both have recovered along with the economy since then, and restrained inflation has helped brake soaring housing costs. In addition, "the major demographic factors are in place to promise a bright future for housing over the next decade, barring unforeseen calamities."

According to Sternlieb and Hughes' projections, married-couple households headed by people aged 35-54, whose incomes are traditionally highest of all households, will account for 8.1 million, or 56 percent, of the 14.5 million total increase in households between 1983 and 1995. In the first half of the 1990s, renter households – dominated by baby busters – will grow by only 175,000 a year, while owner households increase by an average 882,000 a year. This will be a drop from the 1.2 million average owner-household annual gain of the 1970s, Sternlieb and Hughes observe, but the maturing baby boom generation, "more fertile with income than with offspring, will edge the housing market further upscale."

They admit that not all Americans will be able to afford upscale or even adequate housing: younger baby boomers entering the market when prices are higher; workers unequipped for the new high-tech age; and female-headed single-parent families. Cuts in federal housing

*Continued on next page*

*Continued from preceding page*

aid have worsened the low-income housing outlook since 1981 and are unlikely to be restored in the new balanced-budget climate.

Slower projected growth in female-headed households could mitigate the problem somewhat, Sternlieb and Hughes point out. Low-income housing needs are increasingly being taken on by local governments and nonprofit groups, they observe, and could be met in part by more rehabilitation and subdivision of existing housing. They also suggest that homebuilders and mortgage lenders anxious to keep up the market for new housing "could usefully join forces with the poor and their housing needs." – *J.V.T.*

Copies of the 34-page *Population Bulletin*, "Demographics and Housing in America" (Vol. 41 No. 1), can be ordered for $4.00 each; 2-10 copies, $3.00 each; 11-50 copies, $2.50 each, over 50, $2.00 each. Orders of under $20 must be prepaid. Please include $1.00 for postage and handling. Send order and remittance to PRB, Circulation Dept., P.O. Box 35012, Washington, D.C. 20013.

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# McPherson Speaks on Population Pressures

M. Peter McPherson, Director of the U.S. Agency for International Development, argues that the debate about population growth's effect on economic development has often missed the mark.

"Strong family planning programs in the interests of families and individuals ... alone justify the programs even if there were no impact on economic growth," he told the Washington, D.C., audience attending the American Enterprise Institute's Public Policy Week in December.

"The availability or lack of family planning services is of enormous consequence to some families and individuals," he said – a point sometimes lost in the broader debate about the societal consequences of rapid population growth. He listed three categories of family and individual need: "(1) The desire of couples to determine the size and spacing of their family; (2) mother and child survival; (3) reduction of abortion."

"Fewer children are an option which American families take for granted" – thanks to family planning information and services. "We must remember that these services are not available to millions of families in the Third World." Yet many surveys show a large number of Third World women would like to space births or limit their family size but cannot, because of lack of services.

AID head McPherson

Meanwhile, however unclear the linkage between population and economic growth, the debate goes on – a debate that McPherson felt was characterized in black and white terms by the optimists and pessimists involved.

In particular, he described the case of the optimists – those who contend "that nations, over time are able to adjust to the pressures of more people; indeed that the pressure may be a very important stimulus to innovation and growth.

"It seems to me," McPherson continued, "that those taking the position that nations can adjust [to rapid population growth] must assume a degree of political flexibility. They may underestimate, for example, the tribal conflicts, the urban exploitation of a rural majority of many African countries, famines, etc. Also, those who assume that all nations can adjust may not be realistic in judging the ability of fairly primitive societies to obtain technological innovation.

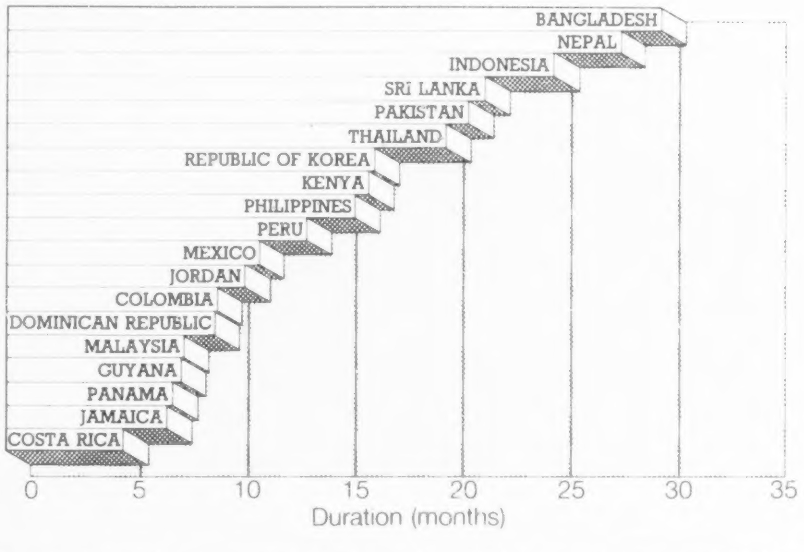
"In short, the situation may be so severe that reasonable adjustments will not occur in a timely fashion and countries just sink deeper into poverty."

McPherson's statement took a broad view of the causes of population stress, paying respect to the efficacy of population programs. As he put it: "The impact of population growth on economic growth is debatable. But almost no one argues that family planning hurts economic growth and it is rare indeed to hear it argued that very rapid population growth contributes to economic growth." – *A.H.*

## SPEAKING GRAPHICALLY

### BREASTFEEDING WORLDWIDE

How long do mothers breastfeed their babies?
Some answers from the recent World Fertility Survey –



Breastfeeding can be seen as one form of natural family planning in that a woman's likelihood of conception is greatly reduced during that period. The UNICEF chart above gives the duration of breastfeeding as recorded in the World Fertility Survey.

# Visiting Scholar Award

PRB invites applications for its Visiting Scholar Award for the nine-month period beginning September 1986.

The Award, made available through a grant from the Andrew W. Mellon Foundation, is intended to provide the visiting scholar an opportunity to carry out a population policy-related project with either a domestic or international focus while in residence in PRB's Washington, D.C., headquarters. In this year's selection, priority will be given to projects that examine relations between population, resource utilization, and environment as they relate to public policy. Proposals for research in other areas are also invited.

The deadline for applications is March 1, 1986. Announcement of the Award will be made on April 1, 1986.

Interested individuals should forward a proposal outlining their planned activities, together with a current resume. Applicants are asked to provide the names of three references who could be called upon to comment on the proposed project. Applications should be sent to:

Visiting Scholar Program
Population Reference Bureau
777 14th St. N.W.
Washington, D.C. 20005

For further information, contact: Dr. Leon Bouvier, PRB's Vice President and director of its Policy Analysis Dept., phone 202-639-8040.

The Award consists of a negotiable stipend to cover salary and travel to and from Washington, D.C., as well as office space at PRB. Applicants are encouraged to consider combining this scholarship with a sabbatical leave when that is possible. Applicants should also indicate the amount of financial assistance they would require in order to accept the Award.

The Visiting Scholar program has been ongoing at PRB since 1980. The 1985-1986 scholar is Robert Gardner of the East-West Population Institute, who has been working on Asian immigration and Asian Americans.

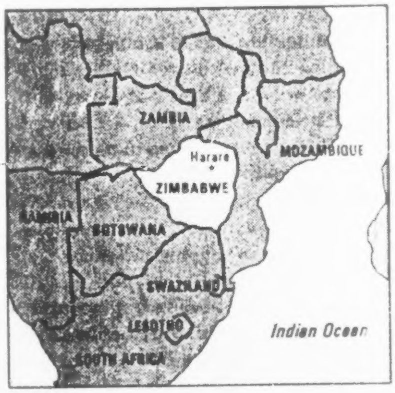
# SURVEY REPORT

## Zimbabwe

A landlocked country in south-central Africa, Montana-sized Zimbabwe (formerly Southern Rhodesia), consists largely of a high plateau 3,000-4,000 feet above sea level with a higher plateau, the *highveld*, running from southwest to northeast. While Zimbabwe's economy has been bolstered by a growing manufacturing sector, income from minerals and agriculture remains the mainstay. A good system of roads and railways has aided development; about half of the population is considered literate.

The Zimbabwe Reproductive Health Survey (ZRHS) was conducted in 1984 by the National Family Planning Council in collaboration with Westinghouse Health Systems in order to provide needed data on fertility and maternal and child health.

The results of the survey indicate an unusually high level of contraceptive use and knowledge and slowly declining fertility, although the women surveyed still expressed a desire for large families. The survey measured a current total fertility rate of 6.5 children, on the average, during a woman's reproductive years. This suggests some decrease from past fertility levels since the women 45-49 reported that they had had an average of 7.5 children. There is also evidence of a desire for child-spacing in that 6 out of 10 of the women 15-24 would like to delay the first birth. Still, the expected number of children was 6, 5.0 in urban settings, 6.6 in rural.



Fully 38 percent of the currently married women were using some form of family planning, 27 percent a modern method and 11 percent traditional. This is the highest rate in continental sub-Saharan Africa reported thus far. The large majority of modern method users, 85 percent, use the pill.

The use of breastfeeding is virtually universal, with the average duration 19 months; this has its own contraceptive effect by extending postpartum amenorrhea and improving the health of infants. While high, Zimbabwe's estimated infant mortality rate of 80 infants deaths per 1,000 live births each year is lower than in many other African countries. Still, one in four of the survey respondents had had at least one child die.

The survey also found that prenatal care is often used by Zimbabwean women. Eighty-eight percent of the women had prenatal care and about 7 in 10 had a medically supervised delivery. But, the use of postnatal care was exactly half that of prenatal.

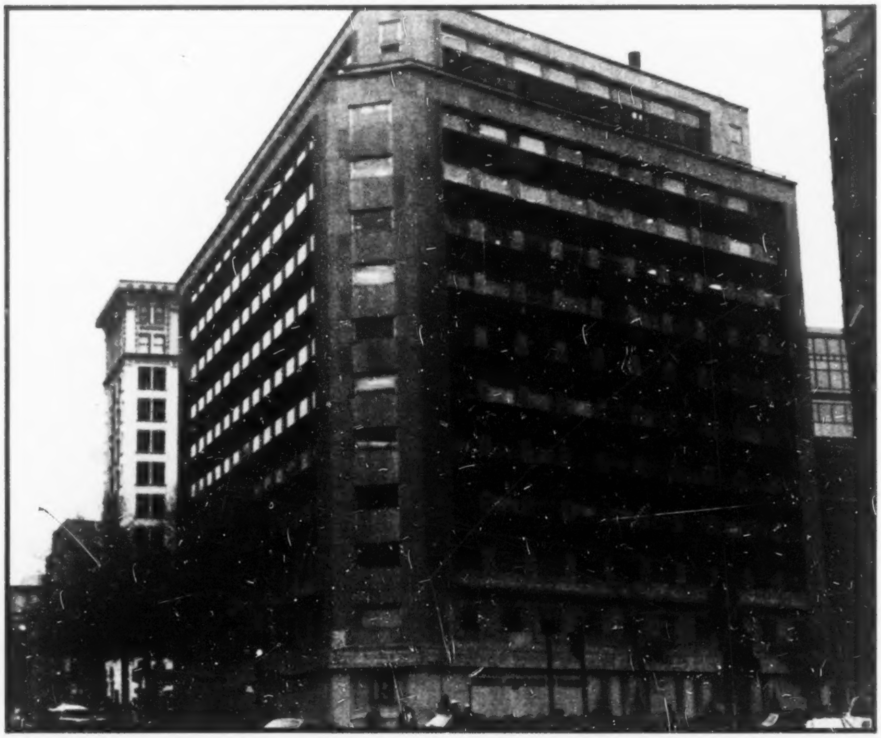
Overall, a climate for greater use of modern family planning methods appears to exist in Zimbabwe. Knowledge of family planning is quite high, the availability of services is good and women feel that closely spaced pregnancies are harmful and that two years is a good birth interval. Still, one must wonder what the prospects for true fertility decline really are since a desire for large families remains the norm. It is, after all, quite possible to have 6 or 7 children spaced two years apart during the principal childbearing years. —C.H.

# PRB Moves to New D.C. Headquarters

In December 1985, PRB migrated to new offices in the building below at the corner of 14th and H Sts. N.W., located in Washington's renascent "old" downtown. The more spacious quarters were necessitated by the increase in staff population to handle the new IMPACT research dissemination project. (IMPACT will foster knowledge and use of population information by policymakers.) At the same time, PRB is expanding its other services in publications, population education, and information services to the public.

PRB's own population now numbers 31 – 5 members of the IMPACT team; 3 editors; 9 demographers; 2 population education specialists; 2 population information specialists; 8 administrative support; and 2 interns.

The new address: 777 14th St. N.W., Suite 800, Washington, D.C. 20005. Phone 202-639-8040. PRB members and population researchers are always welcome during business hours.



PRB's new headqarters

# Contraceptive Use Detailed

Nearly half a million women have been interviewed over the last decade in 61 developing countries through the World Fertility Survey and Contraceptive Prevalence Surveys. These women's answers have been recorded and tabulated, and the results analyzed, representing the world's largest body of knowledge on fertility and family planning around the globe.

For the first time, the major results and findings of these surveys have been presented together, in *Population Reports* (No. 8, September-October 1985), from the Johns Hopkins University's Population Information Program. This publication presents valuable tables along with accompanying commentary and analysis.

Reprinted here are the percentages of surveyed women using any method of contraception at the time of the survey for those countries for which country data are available. Surveyed women included only those currently married, age 15-44. "Any method" of contraception encompasses both modern and traditional methods. The year in which the survey took place is listed immediately after the country name. —J.A.

| Country | % of currently married women 15-44 using any method |
|---|---|
| **AFRICA** | |
| Benin 1981-1982 | 20 |
| Botswana 1984 | 29 |
| Cameroon 1978 | 3 |
| Ghana 1979-1980 | 10 |
| Ivory Coast 1980-1981 | 3 |
| Kenya 1977-1978 | 7 |
| Lesotho 1977 | 5 |
| Mauritania 1979 | 1 |
| Nigeria 1981-1982 | 5 |
| Senegal 1978 | 4 |
| Zimbabwe 1984 | 38 |
| **ASIA & PACIFIC** | |
| Bangladesh 1979-1980 | 13 |
| Fiji 1974 | 42 |
| Indonesia (Java & Bali) 1976 | 28 |
| Korea, Rep. of 1979 | 55 |
| Malaysia (peninsular) 1974 | 35 |
| Nepal 1981 | 7 |
| Pakistan 1975 | 5 |
| Philippines 1978 | 39 |
| Sri Lanka 1982 | 57 |
| Thailand 1981 | 59 |
| **LATIN AMERICA & CARIBBEAN** | |
| Barbados 1980-1981 | 47 |
| Bolivia 1983 | 26 |
| Colombia 1980 | 51 |
| Costa Rica 1981 | 66 |
| Dominican Republic 1983 | 47 |
| Ecuador 1979 | 35 |
| El Salvador 1978 | 34 |
| Guatemala 1983 | 25 |
| Guyana 1975 | 35 |
| Haiti 1983 | 7 |
| Honduras 1981 | 27 |
| Jamaica 1983 | 52 |
| Mexico 1979 | 40 |
| Panama 1979-1980 | 61 |
| Paraguay 1979 | 39 |
| Peru 1981 | 43 |
| Trinidad & Tobago 1977 | 55 |
| Venezuela 1977 | 49 |
| **MIDDLE EAST & NORTH AFRICA** | |
| Egypt 1980 | 25 |
| Jordan 1983 | 26 |
| Morocco 1983-1984 | 27 |
| Syria 1978 | 20 |
| Tunisia 1983 | 42 |
| Yemen Arab Republic 1979 | 1 |

# DEMOGRAPHER'S PAGE

## If Present Trends Continue . . .

### by Carl Haub

"According to Census Bureau forecasts " "The United Nations expects that " "When world population reaches 7.8 billion in 2020 " "Hispanics in the U.S., the country's fastest-growing minority, will surpass blacks in the year " "When world population stabilizes "

This potpourri is representative of the way articles often describe population projections. Projections are one of demography's more popular products, but they come with many implicit caveats. Unfortunately, these warnings are often left unexpressed due to lack of space or time. Until now:

1. *The Weather Bureau makes forecasts, not the Census Bureau.* With considerable confidence, weatherpeople can say that, in the past, when the meteorological situation was thus-and-so on one day, the weather behaved in a certain manner the next (X percent of the time). But they do have a rather detailed "model" to go on that basically stays the same – the earth and its atmosphere. And their model is filled with precedents to guide them. A forecaster can issue a prediction for evening showers and drift off to sleep to the reassuring rumble of approaching thunder.

Demographers, by contrast, often have to make do with scanty or missing data, poor quality data, unpredictable behavior patterns and many other rocks in their path. They are consequently quick to point out that their projections are based on assumptions for the future applied to current data – and even those "current data" may themselves contain assumptions. If the physical earth were in a constant, catastrophic flux, with new continents springing up and the poles constantly shifting, weatherpeople would be quicker to call their weather report a hypothesis of what might be tomorrow. Bring your umbrella.

2. *Projections themselves are never "wrong."* Anyone can make perfect projections. The process of projecting a population is actually a fairly simple series of rote mathematical calculations, applying the *components* of change, fertility, mortality, and migration, to each age *cohort*.

For example, to project females aged 15-19 from 1985 to 1990 (when they will be 20-24), or any age group, we need only derive the number who will survive the five-year period; these proportions are readily available from life tables. Then, if there is some net migration assumed (the balance of those who move in or out of the area or country), that can easily be plugged into the equation. The result: projections of females 20-24 in 1990.

> The whole subject remains cloudy. Perhaps a good adjective to use in describing projections would be 'stylized.'

This simple process works for every age group in the population save one – those who will be born in the future. They haven't arrived yet, and to obtain their numbers we need to make assumptions about future birth rates. These assumptions produce the projected population (say, the 0-4 age group in 1990), whose rates of survival must also be calculated and any migration taken into account. Simple, right?

3. *Cave assumptium.* And yet, what good is a perfect projection – perfect, assuming no wrong buttons were pushed on the calculator, nor any incorrect entries inputted – if the assumptions behind those button-presses turn out to be waaaaay off. Perhaps the most famous example of wrong assumptions in modern history is the failure to anticipate just how long the U.S. "baby boom" would last. The baby boom was supposed to be just a short-term postwar upturn in the birth rate and, once the assumptions were plugged in, out popped the projections, mathematically accurate and perfectly wrong.

4. *Do demographers really "expect"?* For example, when a UN projection is issued for Africa for 2050, does that mean the UN "expects" any particular population size for Africa? In a way, it probably does. The UN usually puts out three projections (high, medium, and low), and the medium one does try to go right down the demographic fairway as far as expectations for a particular population are concerned. But, generally, it's best to use words like "expect" sparingly.

5. *How did they do that?* When dealing with the population of large areas, such as Africa, it would seem that a medium projection would be a relatively safe number to quote, since we could expect the projections for individual African countries to be either too high and or too low. It would be reasonable to expect a fair number of compensating errors.

But, if we are concerned with a single country, then we would do well to expand our vision beyond the medium projections. Future country populations can easily vary by factors of 3 and 4 while that of the entire region follows the medium projections rather well.

We could, then, set down one Golden Rule of projections: the smaller the geographic area, the more one needs to inquire "how the trick was done."

Other factors should be weighed when using projections. How recent were the base data when the projection was run? Often, census data used for the projections may be a decade or more old. While this may not materially affect the results, it also might. It is relevant to know both what assumptions were used and how they were derived.

Most of the time, fertility assumptions cause far more variation in projections

Carl Haub is PRB's Director of Demographic Analysis and Public Information.

than do mortality ones. For developing countries with high or moderately high fertility, it is usual practice to look at indicators which can be linked to fertility decline such as female educational levels, evidence of contraceptive use, and government policies on population growth. These, along with any data available on actual trends, can give guidance on reasonable future assumptions.

6. *Is there a "natural law" for populations to approach replacement level?* Everybody across the demographic spectrum concedes that someday population growth on earth must cease, simply because the total numbers eventually become so large – at present rates, there would be 1 trillion people three centuries from now, 4 trillion people four centuries from now, etc. (Whether the earth is overpopulated now and what its optimum size should be is a lively separate debate.)

Because of that premise, for the sake of projecting future "stationary" populations, we tend to assume that the "two-child" family will be reached and forever maintained (slightly over 2 births per woman on average is the "replacement level" by which a population just replaces itself in the long run, neither growing nor declining). Of course, we don't really know what number of children the world's couples might settle on (or when) but until recently it has seemed to make as much sense to assume that it would be the "replacement" level as anything else.

Recently, however, very low birth rates have been reported in Europe, as low as a lifetime average 1.3 children per woman in West Germany. Since some time has gone by without any sign of significant fertility rise there, some demographers are discussing whether the future holds long-term population decline, rather than the stationary population of replacement-level fertility.

The whole subject remains cloudy. Can or will very low birth rates continue forever? Are we seeing an entirely new kind of population dynamic in the developed countries? It is interesting to note that the most recent Census Bureau projections for the U.S. took as its "middle" series fertility assumption an average of 1.9 children per woman, below the replacement level. Statistics Canada likewise placed constant fertility at 1.7 in its own middle series projection. Such are the questions facing the poor demographer with a blank computer screen prompting: "What is your fertility assumption . . . enter and hit RETURN."

7. *Other assumptions, other projections.* Mortality assumptions usually play a much less important role than fertility, but are still important and should be looked at when using published projections. On the lower end of the scale, fixing the life expectancy of many less developed countries can be quite difficult due to incomplete data. On the higher end, it is more a question of just how high life expectancy can be expected to go. At present, most projections use rather conservative assumptions. In the 1982 UN assumptions maximum future life expectancy at birth was pegged at 75 for males and 82.5 for females. In countries such as Japan, these levels could be attained by the late 1980s. Are the UN levels too conservative? Some say that they are, but what basis exists to select truly high life expectancies such as 90?

Perhaps a good adjective to use in describing population projections would be "stylized." As such, the major sets of projections as produced by the United Nations, the World Bank, national statistical agencies, etc. are invaluable tools which cover a wide range of reasonable possibilities; the U.S. Census Bureau has 30 different series which allow one to look at every conceivable combination of assumptions.

8. *Why run projections at all?* If projections are nothing more than predictable results of one's assumptions of future demographic trends, why run them at all? One reason is that the results of seemingly small shifts in our assumptions can produce surprisingly different future populations.

The Census Bureau's 30 separate series are wide ranging, with the lowest projecting a U.S. population of 191 million in 2080 and the highest, 531 million. While few would expect either of these two extremes to actually occur, these rather large differences are not produced by what one might consider to be outlandish assumptions. The lower number results from a TFR of 1.6 children per woman (it is now 1.8), 250,000 net immigration per year (it is now usually thought to be 450,000) and a peak life expectancy of 77 (up from the present 75). The higher projection used a TFR of 2.3, net immigration of 750,000, and an ultimate life expectancy of 86. But since one must predict demographic trends for the course of the next century, it is impossible not to rule out changes in immigration law or fertility fluctuations only because they seem unreasonable today.

9. *Some final fertility thoughts.* The baby boom and the prediction of Dewey's victory over Truman in 1948 are the favorite examples of the failure of scientific prediction. But perhaps the time has come to stop beating demographers with the baby boom. They have suffered enough. If the baby boom were to happen again, it would certainly throw off current projections. But how likely is that, really?

In addition to the fact that U.S. fertility has been below 2.0 children per woman since 1973, we also have evidence from the Census Bureau's Current Population Survey, which shows that women's childbearing intentions have been about 2 for at least 10 years. Further, many of the factors influencing low fertility have actually increased since the baby boom and can only be expected to continue: two-earner families, costs of living, contraception.

Perhaps fertility will rise again in the U.S., perhaps greater sensitivity to child-care needs by employers will boost the birth rate, perhaps . . . Projections – we all need them, we all want them for what they can tell us about the future. But, in many ways, projections are not "user friendly." ☐

# In Wisconsin, Grandparents Held Responsible for Teen Progeny

The state of Wisconsin has taken the bull by the horns in the fight against teenage pregnancy. In a landmark statute, legislators there voted in November to make parents financially responsible for infants born to their unmarried children under 18. Under the law, both sets of grandparents are required to support the infant if its parents cannot.

The "grandparents' liability law" was part of a 10-part legislative package that united pro-and anti-abortion forces against a common foe: teenage abortion. The 16-member committee produced this wide-ranging law – adopted unanimously by the State Legislature – the "Abortion Prevention and Family Responsibility Act of 1985." Although both sides are uneasy about portions of the bill, neither wanted to cause its failure, thus producing a rare compromise in the battlefield of sex and abortion.

The objective of the act is to reduce the number of abortions by significantly reducing the number of teenage pregnancies, and when pregnancies do occur, by offering teenagers other options. Among other things, the law imposes new criminal penalties on those performing late-term abortions, repeals an obsolete statute imposing criminal penalties against women seeking abortions, removes prohibitions on the display and advertisement of contraceptives (though the sale of contraceptives through vending machines remains illegal), and establishes a state adoption center.

The rationale behind the grandparents liability law is to give parents a larger stake in educating their children about sexuality and contraception. By forcing parents to become more responsible for their children's sexual behavior, State Rep. Marlin D. Schneider, who sponsored the bill, hopes to take from the taxpayers the burden of children whose parents cannot afford to support them. However, the law may have a limited effect on the state's welfare expenditures because many parents of teenage parents are themselves on welfare. Under the statute the incomes of both maternal and paternal grandparents would be considered before a teenage parent could receive public aid. In the past, the income of only the mother was taken into account. The law stipulates that parents are liable to pay "so far as [they] are able" until the teenager turns 18, marries, or joins the military. The law is up for review in three years.

Though the law was a product of the combined forces of both prolife and prochoice advocates, it has not been embraced by all since its passage. Proponents of the law say that it should reduce the welfare rolls, while opponents argue that it might unduly penalize the working poor.

Some Wisconsinites think the law will reduce sexual activity among teenagers, who (proponents hope) may think twice about unprotected intercourse when they know that their parents' pocketbooks are at stake. Others believe it will provide further inducement for abortions. Barbara Lyons of the Wisconsin Citizens Concerned for Life, a prolife group, said in the *New York Times* that girls may be pressured into having abortions because their parents "may see the financial responsibility as being something bigger and more unmanageable than actually it may be."

Guidelines and regulations for the law have yet to be written, however. Social service officals in Wisconsin do not know whether to deny benefits to girls or to grant them public assistance and try to collect later from the liable grandparents. Since the law took effect on Nov. 20, counties have been dealing with situations on a case-by-case basis. The state was expected to issue guidelines by mid-January.

Also in January, a seven-member Pregnancy Prevention board will start distributing $1.7 million in grants to cover the next two years. The grant money will support health clinics in schools, a media campaign to discourage teen sex, adoption counseling, and role-model programs. This money supplements the $1.5 million yearly the state currently spends on teen pregnancy programs, the *Washington Post* reported.

Sixteen-year-old Cindy Dorman said in the *Post* that the prevention of teenage pregnancy "is so important, there should be classes for parents who have a hard time talking to their kids about sex."

*– J.A.*

## Halley

*Continued from page 3*

much a hit-or-miss thing. In a second paper, Halley used the life table to propose a method of annuity calculation, and the way was now clear to calculate the experience of populations – and also make the books balance.*

Interestingly, Halley used his paper to get some pronatalist opinions off his chest:

> *The growth and increase of mankind is not so much stinted by any thing in the nature of the species, as it is from the cautious difficulty most people make to adventure on the state of marriage, from the prospect of the trouble and charge of providing for a family; nor are the poorer sort to be blamed, since their difficulty of subsisting is occasioned by the unequal distribution of possessions, all being necessarily fed from the earth, of which so few are masters.*
>
> *The strength and glory of a King consisting in the multitude of his subjects, I shall only hint, that above all things celibacy should be discouraged, as by extraordinary taxing and military service, and those who have numerous families of children to be countenanced and encouraged---especially by an effectual care to provide for the subsistence of the poor, by finding them employment---*

Demography taken care for the time being, Halley went on to other tasks – the plotting of the earth's magnetic field,

*Continued on next page*

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*The modern life table takes a real population's age-specific death rates and applies them to a hypothetical population, usually 100,000, all born at the same time. As this hypothetical population ages, death causes it to shrink in number, until no one is left. Looking at such a table tells you many things about a population, most conspicuously its members' average life expectancy at any age.

## Halley

*Continued from preceding page*

meteorology, stellar astronomy. He even contrived a way to estimate the size of irregular areas, i.e., English counties, by weighing the appropriate pieces of the map: the simplicity of genius.

### Halley's Prediction

In 1682, a decade before his Breslau calculations, Halley had witnessed the great comet of that year. He consulted with Newton about a law of gravitation that would account for the movements of the Solar System (a problem that Newton basically solved). And it was he who developed the theory that comets, obeying Newton's laws, orbit the sun like planets, albeit in very elongated ellipses.

Researching the past, he found several mentions of comet appearances sharing characteristics in common, including the comet of 1682. He concluded that these were serial appearances of the same bright comet, and in 1705, he predicted that it would return in 1758.

Unfortunately, he died 16 years too soon to see his prediction come true. But in 1758, the comet returned in spectacular fashion, and was promptly dubbed "Halley's Comet" by a comet-fascinated world. And it has revisited the inner Solar System every 75 or 76 years (depending on perturbations from passing planets) ever since.

Edmond Halley, scientist extraordinaire

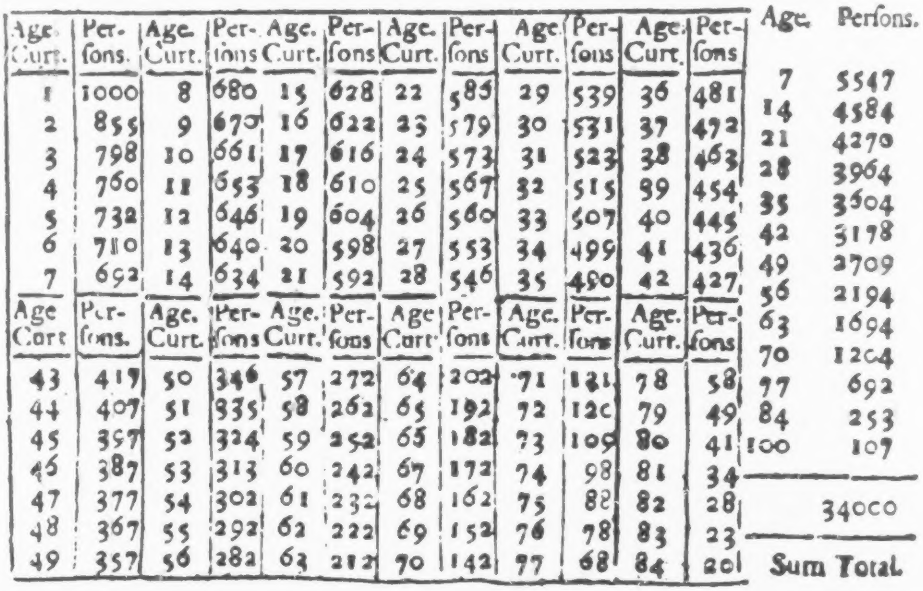
Halley's Comet is hardly the only comet; some dozen comets are visible from Earth each year, writes Nigel Calder in his informative book *The Comet Is Coming*.

There are comets that visit the inner Solar System fairly frequently, but that very frequency means they are on unstable orbits and are being gradually tugged to pieces by passing planets, and are barely visible at all.

Halley itself is the brightest of the 16 "Halley Class" comets that travel in stable orbits to return every 20-200 years. Beyond these are other comets on long trajectories that take thousands or millions of years to complete. And beyond them all is the hypothetical but plausible Opik-Oort Cloud, a vast, ghostly shell of comets encircling the sun, and comprising a comet population numbering somewhere on the order of 100 trillion.

So why is Halley's so famous? It's the brightest comet in its class, it carries the cachet of Edmond Halley's prediction, and while it's as faithful as say, Old Faithful, it doesn't take 20,000 years to do its thing. In fact, one of the things that makes Halley's Comet fascinating is that it's something to look forward to; the frequency of its visits slightly exceeds the life expectancy of most of the world's population. (Only 11 countries, including the U.S., have an average life expectancy of 75 years or more.) That makes Halley's truly a once-in-a-lifetime thrill for most people.

But if there's a bigger thrill than seeing Halley's Comet once, it's seeing it twice – and indeed, some 6 million Americans are alive today who were at least 5 years old in 1910 (old enough to appreciate the heavenly spectacle). It can be projected that about 25 million Americans 5 and over today may be alive when the comet returns in 2061 – according to the life table, courtesy of Edmond Halley. – A.H.



| Age Curt. | Perſons. | Age Curt. | Perſons | Age. Curt. | Perſons | Age. Curt. | Perſons | Age Curt. | Perſons | Age. Curt. | Perſons |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 1000 | 8 | 680 | 15 | 628 | 22 | 586 | 29 | 539 | 36 | 481 |
| 2 | 855 | 9 | 670 | 16 | 622 | 23 | 579 | 30 | 531 | 37 | 472 |
| 3 | 798 | 10 | 661 | 17 | 616 | 24 | 573 | 31 | 523 | 38 | 463 |
| 4 | 760 | 11 | 653 | 18 | 610 | 25 | 567 | 32 | 515 | 39 | 454 |
| 5 | 732 | 12 | 646 | 19 | 604 | 26 | 560 | 33 | 507 | 40 | 445 |
| 6 | 710 | 13 | 640 | 20 | 598 | 27 | 553 | 34 | 499 | 41 | 436 |
| 7 | 692 | 14 | 634 | 21 | 592 | 28 | 546 | 35 | 490 | 42 | 427 |
| Age Curt. | Perſons. | Age. Curt. | Perſons | Age. Curt. | Perſons | Age Curt. | Perſons | Age. Curt. | Perſons | Age. Curt. | Perſons |
| 43 | 417 | 50 | 346 | 57 | 272 | 64 | 202 | 71 | 131 | 78 | 58 |
| 44 | 407 | 51 | 335 | 58 | 262 | 65 | 192 | 72 | 120 | 79 | 49 |
| 45 | 397 | 52 | 324 | 59 | 252 | 66 | 182 | 73 | 109 | 80 | 41 |
| 46 | 387 | 53 | 313 | 60 | 242 | 67 | 172 | 74 | 98 | 81 | 34 |
| 47 | 377 | 54 | 302 | 61 | 232 | 68 | 162 | 75 | 88 | 82 | 28 |
| 48 | 367 | 55 | 292 | 62 | 222 | 69 | 152 | 76 | 78 | 83 | 23 |
| 49 | 357 | 56 | 282 | 63 | 212 | 70 | 142 | 77 | 68 | 84 | 20 |

| Age. | Perſons. |
|---|---|
| 7 | 5547 |
| 14 | 4584 |
| 21 | 4270 |
| 28 | 3964 |
| 35 | 3604 |
| 42 | 3178 |
| 49 | 2709 |
| 56 | 2194 |
| 63 | 1694 |
| 70 | 1204 |
| 77 | 692 |
| 84 | 253 |
| 100 | 107 |
|  | 34000 |
| Sum Total. |  |

Halley's life table for Breslau, 1687-1691

# U.S. Metro Areas on the March Again

The population in U.S. metropolitan areas (MSAs) has grown faster than the nonmetropolitan population since 1980, representing a turnaround from the 1970s, when nonmetropolitan growth was faster, according to the Census Bureau.

This change is not a result of a more rapidly growing metro population, rather it stems from the slowing of nonmetro growth. Metro area growth stayed at the 1970s rate of 1.0 percent a year during 1980-1984, while the nonmetro growth rate declined from the average 1970s rate of 1.3 percent per year to 0.8 percent.

Over 76 percent of the U.S. population is now metropolitan, according to a recent Census Bureau publication "Patterns of Metropolitan Area and County Population Growth: 1980 to 1984." The study further states that 75 percent of the nonmetropolitan population resides in the South and Midwest, while the Northeast and West have relatively small nonmetro components.

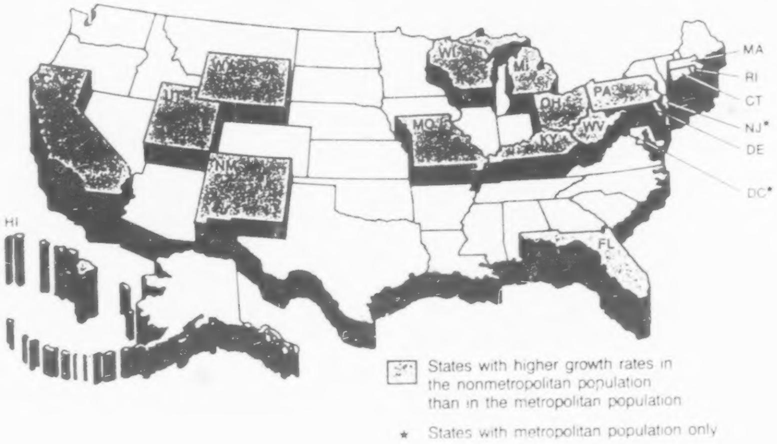
Sun Belt population growth continues in the 1980s. In fact, about 90 percent of the U.S.'s population increase since 1980 has occurred in the South and West. Metropolitan population growth in the South and West continues to be very rapid in the 1980s although the average yearly growth is slightly below the 2 percent recorded during the 1970s. All of the 50 fastest growing MSAs in the 1980s are located in these regions, as are 94 of the 100 fastest growing metropolitan areas.

In the Northeast, where the metropolitan population declined in the 1970s, metro areas are now clearly growing again, the report states. In the Midwest, however, population growth in metro areas has slowed perceptibly since 1980.

Central cities are growing more (or losing less) than they did in the 1970s, while suburban population increase has slowed since the 1970s. Only seven of the 23 MSA central cities of 500,000 or more have lost population since 1980, compared with 13 in the previous decade.

As a group, MSAs of 1 million and over population have higher rates of growth in the 1980s than in the previous decade, while areas below 1 million generally are experiencing slower growth than before. These smaller MSAs are still growing faster than the areas of 1 million or more, but the differences are now small. —J.A.

## States with Higher Nonmetropolitan than Metropolitan Growth Rates: 1980 to 1984


WY
UT
NM
WI
MI
MO
OH
PA
WV
KY
FL
HI
MA
RI
CT
NJ*
DE
DC*
States with higher growth rates in the nonmetropolitan population than in the metropolitan population
* States with metropolitan population only

# Americans at Least Know What's Good for Them

In this fitness-conscious society, how much does the American public really know about staying healthy and preventing disease? Quite a bit, actually, according to the Health Promotion and Disease Prevention Supplement to the National Health Interview Survey, conducted by the National Center for Health Statistics.

170,000 men and women over 18 years of age were interviewed about personal practices related to health, and about their awareness of various factors on the prevention of disease.

All in all, respondents were aware of the detrimental effects of cigarette smoking and alcohol consumption, and were well versed on the causes of such ailments as heart disease and high blood pressure. Respondents seemed especially well informed about maintaining dental health.

Do they practice what they preach?

*Continued on next page*

## POSITIONS/ PROFESSIONALS

**Senior Research Analyst** needed by international organization conducting research in health and family planning. Duties include development and management of projects in less developed countries. Doctorate or Masters level in sociology/demography or maternal and child health. Sound knowledge of statistical methods and computer software for data analysis and demonstrated report writing skills required. Fluency in Spanish or French preferred. Salary range: $19,200-$30,200 based on experience. Contact: Personnel, Family Health International, 1 Triangle Drive, Research Triangle Park, NC 27709. An Equal Opportunity/ Affirmative Action Employer, M/F/H.

## Americans Know

*Continued from preceding page*

The survey's questions on general health habits reveal that, for the most part, the respondents maintain good health practices such as visiting the same doctor or health facility regularly. Fifty-five percent of the respondents (87 percent of those over 65) said that they eat breakfast almost every day. A large proportion of those surveyed, however, (66 percent) reported that when visiting a doctor for routine care, proper foods are rarely or never discussed.

That old adage that eight hours per night is the correct amount of sleep seems to be true for many of the survey respondents. Sixty-six percent get seven to eight hours of shuteye each night on average, while 22 percent report less than seven hours and 12 percent more than nine hours.

There are several glaring exceptions to the rule, however. To the question, "When driving or riding in a car, do you wear a seat belt?" more respondents answered "Never" (36 percent) than did "All or most of the time" (30 percent). 18 percent say they wear their seat belts some of the time, and 16 percent once in a while. (Of all those interviewed, 1 percent don't ride in cars at all, though that percentage drops to 0 in the 18-28 years category.)

In addition, despite the fact that awareness of the negative effects of cigarette smoking is high, 30 percent of the respondents are current smokers, 25 percent former smokers, and 45 percent say they've never smoked. For the age category 18-29 years, those who have never smoked number 56 percent, though the proportion of current smokers stays steady at 30 percent.

Only 37 percent of those surveyed (27 percent of the men and 46 percent of the women) were trying to lose weight at the time of the interview. True to form, the respondents were correct in replying that eating fewer calories and increasing physical activity are the two best ways to lose weight. A full 48 percent surveyed considered their weight "about right" and 20 percent thought of themselves as "only a little overweight." —*J.A.*

# SOFTWHERE

**POPGRO: A Population Growth Simulation** is an interactive program which allows the user to study three growth models: an unlimited growth model, a limited growth model, and a limited growth with lag time model. The user inputs initial population size, growth rate, carrying capacity, duration of simulation, and response time lag. Output is provided in the form of data tables, population vs. time graphs, and $\log_e$ (population) vs. time graphs.

This program was designed for use in the high school and college classroom. It is useful for anyone who wishes to compare population growth models.

POPGRO is available for the following computer types: TRS-80, Model I/II; Apple, II/II+/IIe; Commodore; and IBM PC. To obtain program diskette and 30-page manual which includes sample exercises, send $49.95 to: Diversified Educational Enterprises, 725 Main Street, Lafayette, Ind. 47901.

# POPULATION UPDATE

## Estimated United States Population

| | |
|---|---|
| As of August 1, 1985 | 239,019,000 |
| As of August 1, 1984 | 236,896,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 978.

## Estimated World Population

| | |
|---|---|
| As of January 1986 | 4,887,000,000 |
| Annual Growth | 82,000,000 |

Estimated by extrapolation of the mid-1985 world population given on PRB's 1985 World Population Data Sheet.

## Latest Provisional Statistics for the U.S.: August 1985

| | 12 months ending with August | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,743,000 | 3,642,000 | 15.8 | 15.5 | 15.8 | 16.0 |
| Deaths | 2,077,000 | 2,029,000 | 8.7 | 8.6 | 8.6 | 8.5 |
| Natural increase | 1,666,000 | 1,613,000 | 7.1 | 6.9 | 7.2 | 7.5 |
| Marriages | 2,443,000 | 2,449,000 | 10.3 | 10.4 | 10.6 | 10.6 |
| Divorces | 1,182,000 | 1,161,000 | 5.0 | 4.9 | 5.1 | 5.2 |
| Infant deaths | 39,200 | 39,100 | 10.5 | 10.7 | 11.0 | 11.4 |
| Population base (in millions) | | | 237.6 | 235.2 | 233.0 | 230.8 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

*Source.* *Monthly Vital Statistics Report* (Vol. 34, No. 8) from the National Center for Health Statistics.

# A U.S. Profile in Numbers

If you've ever wanted a population publication that compactly summarized what's going on demographically in the U.S. today, you might consider the Census Bureau's *Population Profile of the United States: 1983/84.*

This latest edition in the Bureau's series of profiles is full of basic population data and trends. It summarizes the wide range of demographic, social, and economic data collected by the Census Bureau during 1983 and 1984. Each section deals with a major subject, and in addition spells out the bottom line in clear prose highlights.

Thus, in the *Profile* you can discover that: the U.S. population is expected to pass the 300 million mark in 2024; 75 percent of the population lived in one of the nation's 277 metropolitan areas in 1983; there were 12.3 million college students in 1983, 1.5 million of whom were age 35 or older; and the population 18 to 24 years old reached an all-time high of 30.5 million in 1981 but will never again be as large, based on middle series projections.

From 1980 to 1983, 24 states experienced net out-migration, but this population loss was offset by natural increase in 20 of them so that 46 states recorded population growth (the other four lost population: Michigan, Ohio, Iowa, and Indiana).

In 1984, 52 percent of American men and 32 percent of women 20 to 24 years of age were living with one or both of their parents, compared with 43 percent and 27 percent, respectively, in 1970.

While real median family income rose in 1983, to $24,580, this figure remains below that of 1973, when it was $27,000 in 1983 dollars.

The data primarily cover the U.S.; however, some data at the state level are provided. The data are presented with illustrative charts and graphs; summary tables of annual data on demographic, social, and economic characteristics are appended. —*W.P.*

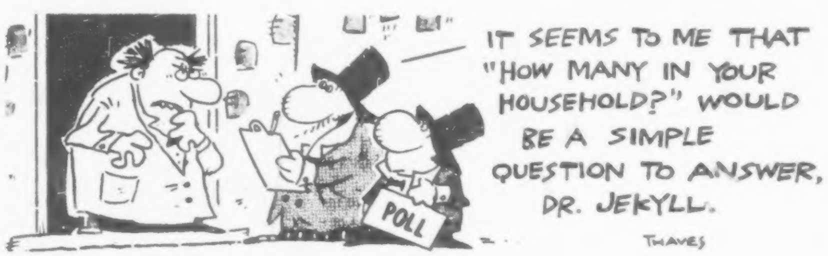
This *Population Profile of the U.S. 1983/84* (Current Population Reports Special Studies, Series P-23, No. 145) is on sale for $3.25 by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

# TAKE A NUMBER

**German Birth Rate Down Again!:** Following on our previous reports on the German birth rate, *Population*, the French demographic journal, reports that the West German total fertility rate (TFR) declined to 1.27 children per woman in 1984 (it was 1.32 in 1983). Although a national-level TFR of 1.0 seems inconceivable, one must again wonder just how low German fertility can go.

**Big Apples and Big Oranges:** New Yorkers may have been chagrined to hear that their fair city is due to be passed by Los Angeles in population by the year 2000, according to the Bureau of Economic Analysis projections. By 2000, the BEA projects that the Los Angeles area will be home to 8.9 million residents, besting Gotham's 8.4 million. *Sic transit gloria hudsonensis?* New Yorkers may well wonder how their city of 7 million can be passed by one of 3 million. It happens that the BEA projections were put in terms of "metro areas." Here we have an interesting case of the claim to urban primacy based on a somewhat arbitrary statistical definition. The Los Angeles "metro area" as defined in the BEA report is the *Primary* Metropolitan Statistical Area (PMSA) which consists of L.A. and its suburbs of Burbank, Long Beach, etc., all in Los Angeles County. The entire L.A. metro area, however, the *Consolidated* MSA (CMSA), has a total population of 12.4 million, far short of the New York CMSA's 17.8 million. The L.A. CMSA is defined as stretching from Riverside-San Bernadino to Oxnard to the north while New York's includes the Jersey area and Connecticut and Long Island commuter counties. While many of those "commuter areas" are becoming less so, we are left with the following: New York *city* is much larger than Los Angeles *city*, the New York CMSA is larger than the Los Angeles CMSA and that should also be the case in 2000. But, the L.A. PMSA is projected to pass the New York PMSA (which includes only the Big Apple and its New York suburban counties to the north). Confused? Regular *PT* readers will remember the "Demographer's Page" in the November 1985 issue which discussed the new metro definition. Finally, this defense of New York's status has no relation to its writer's geographic origins. We would *never* stoop to that. —*C.H.*

# ADDENDA


POLL
IT SEEMS TO ME THAT "HOW MANY IN YOUR HOUSEHOLD?" WOULD BE A SIMPLE QUESTION TO ANSWER, DR. JEKYLL.
THAVES

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# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

**THE DICTIONARY OF DEMOGRAPHY,** by Roland Pressat, edited in English by Christopher Wilson. Oxford, England: Blackwell Reference, 1985. 243 pages. $60.00. ISBN 0-631-12746-1

This ambitious undertaking is the English version of Pressat's *Dictionaire de Demographie*. It is more than a translation; indeed as the English editor states: "The English- and French-speaking worlds of demography are not identical. This difference is reflected in the two dictionaries, the present work covering a wider range of material and methodology than the French volume."

Pressat himself comments that "It is with a certain regret that I note a certain looseness in the terminology which is likely to be a reflection of the nature of the Anglo-American demography, which is manifestly more liberal than its French counterpart." The author and the editor do not necessarily see eye to eye on a number of points.

These comments do not detract from the excellence of this monograph. A total of 230 pages are devoted to not only defining but explaining, often in detail, demographic terms and concepts – and more than just basic terms. Concepts like momentum and total fertility rate (and Bongaart's decomposition) are clearly explained. Where appropriate, graphs and formulas are used.

The biographical entries leave much to be desired, however. Although it is not stated, these are apparently limited to deceased persons. The dictionary's compiler seems to have been particularly concerned with those who worked on life tables including such somewhat arcane names (to American audiences) as Antoine Deparcieux and William Kersseboom. Only one American is included: Alfred Lotka. One looks in vain for such major American contributors to the field as Raymond Pearl, Pascal Whelpton, and incredible as it may seem, Frank Notestein! It would have been preferable to delete the entire biographical portion of the Dictionary rather than have such obvious omissions.

Aside from this major weakness, *The Dictionary of Demography* is an excellent work and will be of great utility to any demographer or anyone interested in learning more about the discipline.

*– Leon F. Bouvier*

**CENSUSES OF ASIA AND THE PACIFIC, 1980 ROUND,** edited by Lee-Jay Cho and Robert L. Hearn. Honolulu: East-West Population Institute, 1984. 380 pages. $15.00. ISBN 0-86638-052-3

This volume is the second edition of the East-West Center's classic compendium on census-taking in the Asian and Pacific region. The 1980 "census round" volume describes enumeration methods in 19 countries from Pakistan to the U.S.

The censuses are covered in detail with quick reference tables on subjects investigated by each census and facsimiles of the questionnaires in the Appendix. We can quickly determine that, while marital status was asked on all 19 censuses, only New Zealand inquired about cigarette smoking. Indonesia and Thailand asked a question on the ever-use of contraception on a sample basis, an unusual topic for a national census.

Census methods reflect the difficulties encountered in counting the people in developing country settings. Pakistan uses radio jingles to overcome literacy problems, while in Papua New Guinea, census enumerators wear special T-shirts so that villagers know that the census team has arrived.

*Censuses of Asia and the Pacific* is an invaluable contribution to the field in that, among other things, it makes us more aware of the conditions under which data are collected.

*-- Carl Haub*

**LA FAMILIA: Chicano Families in the Urban Southwest, 1848 to the Present,** by Richard Griswald del Castillo. South Bend, Ind.: University of Notre Dame Press, 1984. 224 pages. $18.95. ISBN 0-268-01272-5

Griswald del Castillo has provided a historical evaluation of popular myths or stereotypes which have developed about the Mexican family. Paradoxically it is often seen as a warm, supportive, and well ordered unit while also being patriarchal, authoritarian, and responsible for the low degree of assimilation into American life because it does not emphasize educational and occupational advancement.

The author has focused on the disruptive effects of industrialization and urbanization, the continuing Mexican immigration, intermarriage with non-Mexicans, and patterns of changing values which have had diverse influences on this ethnic group.

The detailed historical analysis shows that Mexican American families in the U.S. have often not matched the stereotyped images. Families have had to be flexible and adaptive to survive. Different social, political, and economic factors have contributed to both their historical and contemporary diversity. Yet there is the conclusion that despite profound changes in the material and cultural environment, an important heritage from the past remains. This promises love, self-respect, hope, and caring as essential aspects of these families.

*– Jerry N. Judy*

# THE PHILIPPINES

**Population (1985 est.): 56.8 million**
**Births per 1,000 pop.(1983 est.): 32**
**Deaths per 1,000 pop.(1983 est.): 7**
**Rate of population growth: 2.5 percent**
**Total fertility rate: 4.7**
**Infant mortality rate: 50 infant deaths per 1,000 live births**
**Life expectancy at birth: 64 years**
**Exports(1984): Coconut products, sugar, electrical components, garments – US$5.3 billion**
**Imports: Petroleum, industrial equipment, wheat – US$5.9 billion**
**GNP per capita (1983): $760**
**Capital (*de facto*): Manila**

**by Alexander von Cube**

While the Philippine archipelago consists of 7,100 islands and islets extending 1,100 miles off the Southeast Asian rim, eleven islands account for 95 percent of its land mass. Luzon, about the size of Kentucky, and Indiana-sized Mindanao are by far the two largest. Mountains and uplands constitute two-thirds of the country's area and the most important agricultural area, 100 by 40 miles in size, is located on Luzon.

Magellan claimed the islands for Spain in 1521 and they remained under Spanish rule for the next 377 years. The country's population of 57 million is 83 percent Catholic, a legacy of Spanish rule, while the balance is Protestant or Muslim. There are nearly five million members of diverse cultural groups in the country and about 100 languages and dialects are spoken, although Pilipino, a derivation of Tagalog, is the national language and English is the language of government. The country came under U.S. administration following the Spanish-American War, but attained independence in 1946 with a constitution patterned after that of the United States.

About half of the Filipino population is employed in agriculture, which accounts for about one-fourth of the national economy. The country's economy has been sluggish in recent years, with the decline in world sugar prices and a drop in the export of forest products, a result of past slash-and-burn practices.

The growth of the population has been a concern of the government, and a policy to reduce the growth rate has been adopted. In 1970, President Marcos announced an official policy of family planning. The population act signed in August 1971 stated in part: " quantitative goals will be established and adopted and family planning will be made part of a broad educational program " Prime Minister Virata recently stated that current population and food production growth rates, if continued, would lead to a one-third food shortage later in this century. The government's population program makes a variety of family planning services available, while safeguarding a couple's right to choose their number of children; abortion is illegal in the Philippines.

In 1948 the population of the Philippines was 19 million, so there has been nearly a threefold increase to the present. While fertility has fallen to an average of a little less than 5 children per woman, rising life expectancy has kept the growth rate at a rather high level. The Philippines now rank 15th in population worldwide.

The long-term policy goals also include replacement fertility or an average of 2 children per family by the year 2000. To achieve these goals the program is currently designing and implementing projects to reach preschoolers, age 0-6, youths age 7-14, and the premarriage group of 14 through 24. The national plan encourages young women to delay marriage until at least the age of 20.

The United Nations "medium variant" projection indicates that the population would grow to 103 million by 2025, assuming that fertility would fall to the "two-child" family by 2020-2025. While fertility has fallen from an average of 6.5 children per woman in 1960 to 4.7 in 1980, the data also suggest that the decrease in the latter half of the 1970s was not as rapid as the earlier half. It would appear that the government's goals for population growth are not being met. And, despite the fertility decrease, the country's population is still quite young, with about 43 percent below the age of 15.

The Philippines provides one example of a national program to retard population growth while strictly avoiding any coercive measures to achieve that goal. Yet Philippine planners will need to prepare for a population about twice the present size in the early 21st century, even if the government's aims are met.

Alexander von Cube is a Population Information Specialist at PRB

Philippine Embassy

Ceremonial sailboats at Zamboanga on the island of Mindano

# POPULATION TODAY

Vol. 14, No. 2 February 1986

## FEATURES

2 **The world's agricultural labor force growing only slowly**
Is the land full or just productive?

3 **Dropping toward replacement level, the world still grows**
6.1 billion people in 2000, 8.2 billion in 2025 seen in UN Population Division's newest projections

4 **A demographic perspective on the turmoil in Central America**
Rapid population growth aggravates tension caused by repression and injustice, PRB report finds

4 **When guest workers don't go home**
Instead of "rotating" back to Turkey as expected, these "temporary" Turks now constitute 2 percent of the German population

5 **Fertility high in rural Lebanon**
But women's contraceptive knowledge and ability [illegible] found to be widespread

6 **Future immigration and American blacks**
Composition of black population in for changes as new ethnic groups enter U.S.

9 **The computer game of "Life"**
A population "test tube" and [illegible] "guide"

## DEPARTMENTS

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10 Take a number
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12 Spotlight (Connecticut)

Displaced children in Dammour, south of Beirut, Lebanon. See page 5.

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# FROM THE EDITOR'S DESK

Trivia question—what 830-million subpopulation has almost stopped growing? (0.1 percent annually in 1982 and 1983).

No, not India, not more developed worlders, and not Yuppies. The answer is: the economically active population in agriculture (source: *FAO Production Yearbook*). In the years 1980 through 1984, this population has remained in the 830 million range after decades of growth.

The leveling-off of the number of agricultural workers is rather amazing, even bearing in mind that over 40 percent of the world's population still lives on the farm, economically "active" or not. Depending on your mood, you can interpret it as meaning that:

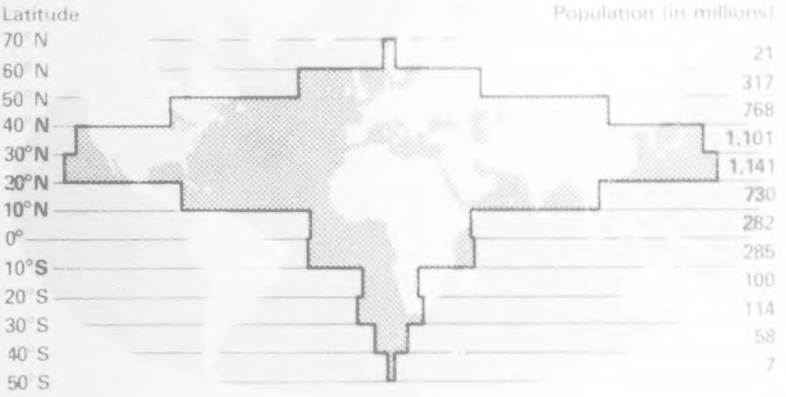
(a) The world's people will never run out of arable land. Thanks to modern methods, no more farm population is needed and the world can now go on to nonagricultural progress: building industry, cities, etc. Within a few decades, world agriculture could well be in the same position as U.S. agriculture, i.e., a miniscule population feeding an entire planet of potentially gigantic carrying capacity.

(b) The world's people have just run out of arable land. The land can't support any more people and the overwhelming majority of future population growth will be nonagricultural. During these same early 1980s years, the world's population grew by over 300 million people, from about 4.4 billion to 4.7 billion.

Take your pick. But "carrying capacity" implies more than the earth's ability to support you. It implies that you can make a place for yourself. And what is happening now is that on an earth where some 44 percent of the "jobs" are agricultural, for the majority of new job seekers that career choice has largely become passé.

—A. Haupt

# SPEAKING GRAPHICALLY



It's a northern world! As the bar chart above shows, roughly 88 percent of the world's population lives in the Northern Hemisphere, with about two-thirds residing in the northern Temperate Zone. Only one out of eight people lives below the Equator. But no, that doesn't necessarily mean that the Southern Hemisphere is underutilized. (all water)

Chart prepared by Wendy Patriquin using PRB estimates; chart drawn by George Hager.

POPULATION TODAY

VOL. 14, NO. 2 February 1986

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# The New Top 10 and Other Population Vistas

A world with 8.2 billion people growing at nearly 1 percent annually—that's the picture of the world in 2025 painted in the latest medium-variant projections from the UN Population Division.

Ever since World War II, a major transition in the world's population trends has been played out, with the world's growth rate peaking around 1965-1970 (at 2.1 percent). Since then, it's come down. But the overall shape and outcome of world population growth remains a question that challenges demographers.

The latest to-be-published UN figures projecting the next four decades are unsurprisingly quite similar to the previous set, published in 1982. But they are important because they represent the state of the art in the most widely used projections, and because, at least for short-run figures, the UN enjoys a record of success in hitting the mark. For many years, its medium-variant projection has shown a 2000 world population of about 6.1 billion. With 1986 world population of about 4.9 billion growing at about 1.7 percent annually, the UN's 2000 projection seems like a better bet every year. Of course, 2000 gets closer every year too.

What kind of fertility assumptions drive those projections? These figures assume that without exception fertility will fall in every less developed country, and that all are ultimately headed toward replacement-level fertility (about 2.1 lifetime births per woman). The speed with which they're headed, as shown in the UN projection tables, depends upon an individual assessment of each country's fertility history, current trends and anticipated changes, and the status and prospects of family planning programs. (In the case of the low-fertility more developed countries [MDCs], it's assumed that fertility will ultimately inch toward replacement level—in these cases by *rising*.)

The medium, high and low variants give a broad spread of reasonable possibilities in each category, with medium the most emphasized—the middle of the fairway, so to speak.

Some sidebars of the next few decades of population growth:

- MDCs could shrink significantly as a proportion of the world population—from 24 percent in 1985 to 17 percent in 2025 in the medium projection.
- Fertility rates in the LDCs have already dropped a great distance from the 6.1 TFR of the 1960-1965 era—to around 3.7 in 1985-1990 (medium variant). They are projected to descend further—to an average 2.4—over the next 40 years.
- In the year 2025—even at the low variant rate of growth and the low variant population, the world is projected to be adding 46 million people annually (at the high variant, it would be adding 118 million).

*Continued on page 8*

## Population Projections

| World | 1985 | 2000 | 2015 | 2025 |
|---|---|---|---|---|
| med. var. | 4,837 | 6,122 | 7,414 | 8,206 |
| high var. | 4,871 | 6,340 | 6,879 | 9,088 |
| low var. | 4,839 | 5,927 | 6,879 | 7,358 |

| Less developed countries | 1985 | 2000 | 2015 | 2025 |
|---|---|---|---|---|
| med. var. | 3,663 | 4,845 | 6,059 | 6,809 |
| high var. | 3,694 | 5,031 | 6,519 | 7,572 |
| low var. | 3,648 | 4,680 | 5,592 | 6,064 |

| More developed countries | 1985 | 2000 | 2015 | 2025 |
|---|---|---|---|---|
| med. var. | 1,174 | 1,277 | 1,355 | 1,396 |
| high var. | 1,177 | 1,309 | 1,434 | 1,516 |
| low var. | 1,171 | 1,247 | 1,287 | 1,294 |

## The Top Ten—1985 and 2025

| 1985 |  |  | 2025 |  |
|---|---|---|---|---|
|  | country | pop. (millions) | country | pop.* (millions) |
| 1. | China | 1,060 | China | 1,475 |
| 2. | India | 759 | India | 1,229 |
| 3. | USSR | 279 | USSR | 368 |
| 4. | U.S. | 238 | Nigeria | 338 |
| 5. | Indonesia | 166 | U.S. | 312 |
| 6. | Brazil | 136 | Indonesia | 273 |
| 7. | Japan | 121 | Brazil | 246 |
| 8. | Bangladesh | 101 | Bangladesh | 219 |
| 9. | Pakistan | 100 | Pakistan | 210 |
| 10. | Nigeria | 95 | Mexico | 154 |

*Medium variant projection.

# Profile of a Region in Turmoil

Rapid population growth is not the source of the political unrest currently plaguing Central America, though it has been a contributing factor, according to sociologist Sergio Diaz-Briquets in the latest PRB *Population Trends and Public Policy* paper, "Conflict in Central America: The Demographic Dimension."

Seven years after the first signs of political upheaval in Nicaragua, countries in Central America are still at war with themselves. Those countries not threatened with military violence face other enemies, including high population growth rates, continued economic downturns and widespread poverty. Diaz-Briquets argues that years of political repression and injustice combined with rapid population increase caused the current crisis.

"Population growth must be put in proper perspective with other underlying causes of instability," writes Diaz-Briquets. Between 1950 and 1970 the region enjoyed broad economic growth, raising popular expectations for political participation. Beginning with the world oil crisis in 1973, however, the region's once bright future dimmed. Rapid population growth exacerbated the effects of this decline.

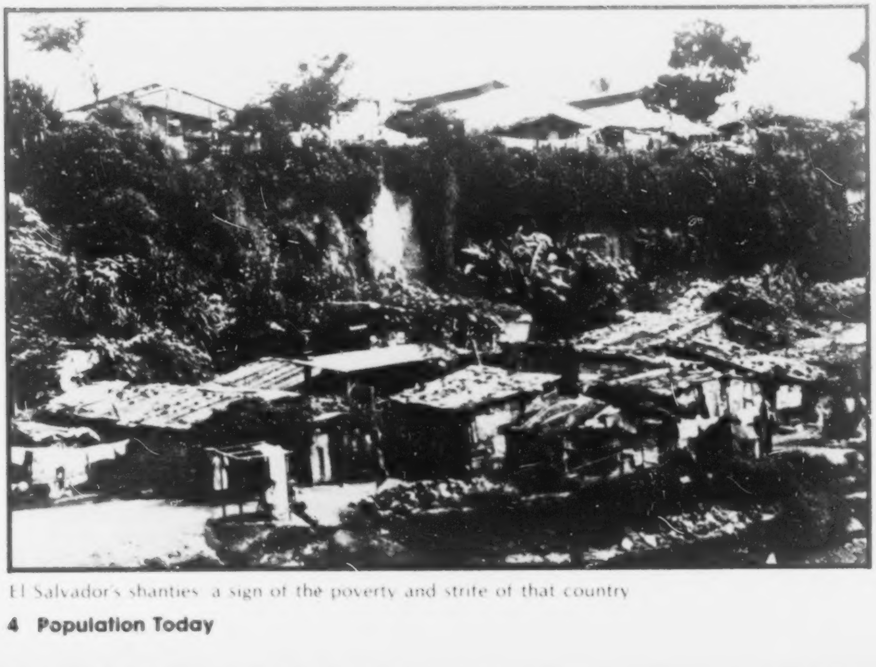
Accompanying economic decline were incidents of violence and political unrest. A tradition of unequal land distribution, aggravated by the development of large export-oriented farms that deprived peasants of their land, added to a sense of social injustice. Education levels, although improved, remained inadequate in many countries. Unemployment increased. The poor masses in urban and rural areas faced substandard living conditions with few social programs. This resulted in bloody uprisings that fueled revolutionary movements.

The region's history has been one of high population growth. Since 1945, Central America's population has tripled in size, straining social and political institutions. During the 1960s, the region had one of the highest population growth rates in the world; only recently have these rates dropped below 3 percent per year.

The UN projects that by the end of the 20th century the region's population will have increased by 60 percent, from its present-day 25 million to 40 million. This growth affects employment, education and standards of living — all contributors to economic and political unrest.

"In order to be effective, efforts toward population limitation must be made within the framework of political and economic reform," asserts Diaz-Briquets. "Fertility limitation efforts made in isolation from the social reality of the region can be counterproductive," he concludes.

Copies of "Conflict in Central America: the Demographic Dimension" (16 pages) are available for $3.00 per single copy; 2-10 copies, $2.30 each; 11-50 copies, $1.90 each; 51 or more, $1.50 each. Orders of $20 or less must be prepaid and include $1.00 for postage and handling. Send order and remittance to Circulation Dept., PRB, P.O. Box 35012, Washington, DC 20013. Make checks payable to PRB.



El Salvador's shanties: a sign of the poverty and strife of that country

# Turk Workers Remaining in West Germany

With the overthrow of the Menderes regime by the army in 1960, fundamental political and economic changes took place in Turkey. The new military regime was determined to build up the country's economy and to utilize labor migration as a component of modernization and development. It was assumed that the Turkish migrant worker who went to West Germany would improve his vocational skills, acquire modern standards of living, and thus become an innovative change agent who, upon his return to Turkey, would contribute to the modernization of that economy and society.

This concept developed into what became known as the "rotation principle" — the idea that workers should rotate between Turkey and West Germany on a scheduled basis, staying in the host country for a stipulated period of no more than three to five years.

However, in the period between 1973 and 1975 a series of events permanently changed the manner in which the Turkish workers were viewed in West Germany. The oil embargo, the subsequent fourfold increase in the price of crude oil, a period of recession, the unemployment of more than 1 million West German workers, and the growing awareness of the impact of the Turkish workers and their dependents upon German society, all led to the rotation principle becoming obsolete.

Germany imposed a strict immigration ban in 1975. It was assumed that large numbers of Turks would return to their homeland, taking Germany's unemployment problems with them, but nothing of the sort occurred. Since the Turkish workers are not in competition for the same employment opportunities as their German counterparts, unemployment rates for the migrants are generally no higher than those for the entire national work force. Furthermore, the severity of their unemployment is cushioned by a variety of unemployment benefits and services. Housing allowances, family children's allowances, and medical care are all available. The sum total of such benefits might easily exceed the option for earned income in Turkey.

The result: in spite of the immigration ban, the Turkish population in West Germany has remained stable to this day due to its high birth rate and to family reunification. Together with their families the Turkish workers now number 1,193,000 persons, which is 2 percent of Germany's population, or more than one-quarter of all guest workers in West Germany. Today, the number of Turkish workers and their dependents make West Berlin the city with the third largest Turkish population in the world.

*Anton Anderegger*
*Lewis and Clark College*

# Social Security Data Now Available

Results of the 1982 New Beneficiary Survey (NBS), which interviewed 18,599 persons in October-December 1982 and linked their responses to administrative data on benefits, is now available on public-use tapes.

The NBS contains representative samples of persons who first received Social Security benefits in mid-1980 to mid-1982.

The survey questionnaire contains a wide range of topics, including household composition, employment history and job characteristics, health, sources and amounts of income received in the last three months, income from assets and holdings, marital history, and child care. First findings of these data are presented in the *Social Security Bulletin* beginning in January 1985.

For more information on NBS or to order, call Joel Packman at 301-594-0348. The NBS data set costs $150 and is available with documentation on one reel of computer tape.

# SURVEY REPORT

## Rural Lebanon

Given the present protracted and multifaceted civil war in Lebanon, any demographic data from the country are welcome to those studying the demography of the Arab world. The last census taken in Lebanon was in 1932 and ever since there has been a general lack of any type of demographic data. This statistical void is in part due to political tensions between Palestinians and Christians; a census pointing to a clear numerical majority for one group could be particularly inflammatory. A 1977 French study, however, estimated that the country was 55 percent Muslim.

Lebanon used to be the financial capital of the Middle East, but since 1975 its economy, agricultural sector, communications, roads, and industries have been severely disrupted by civil strife. During the few lulls the economy showed remarkable recuperative ability, but these resurgences have been short-lived.

In order to update family planning information gathered in 1971, the Lebanon Family Planning Association decided to conduct a new survey (as part of the USAID-supported Contraceptive Prevalence Studies II program and with the technical help of Westinghouse Health Systems). Since a national survey was not possible due to hostilities, the survey was conducted in the rural areas of West Bekaa, and North and South Lebanon. The new report covers interviews with 1,455 women in West Bekaa and the South only (fieldwork in the North was delayed).

When questioned on their expected family size, the respondents in the South said that they expected to have an average of 5.9 children, while those in West Bekaa said 5.2. This figure was somewhat lower for the younger women—about 3.5 children for women aged 15-19, but the report notes that the sample size for this age group was quite small. The reported number of children ever born indicates that cumulative fertility, however, has been quite high among rural Lebanese women. Women aged 40-44 in the South said they had had about 8 live births during their lifetimes; those in West Bekaa reported 7.

Knowledge of family planning methods was universal across all age groups, with an average of seven methods known. High percentages of women reported that they had used a modern method at some time: 84 percent in the South and 63 percent in West Bekaa. Of the modern methods, the pill was by far the most popular. At the time of the survey, 47 percent of the Southern women and 31 percent of those in West Bekaa reported that they were actually using some type of method. Larger proportions of women in West Bekaa reported that they were using a traditional method such as rhythm: 38 percent as compared with 15 percent for the South. The lower reported actual fertility in West Bekaa suggests that the traditional methods are not without their effect. There was no evidence in the survey that education, working status, or husband's education or occupation played any role in the likelihood of a woman's using family planning.

When questioned on their desire for additional children, only about 36 percent of those with 1 or 2 children indicated that they wished to cease childbearing. For those with 3-5 children, this figure reached about two-thirds. Thus, based on responses to questions on children expected and the desire for future births, it seems that rural Lebanese women generally plan for about 5 births, 4 at a minimum. With the comparatively good availability of family planning and high husband approval (about 85 to 90 percent), it would appear that rural Lebanese women do have the ability to limit their number of children to some desired number.

Unfortunately, it may be some time before national-level data are available from Lebanon, but this survey does help to fill in some gaps in our knowledge of this troubled country.

—*CH*

# DEMOGRAPHER'S PAGE

## Immigration and the Future U.S. Black Population

by John Reid

Blacks have been present in what is now the United States since as early as 1619, when the first slave bearing ships landed in Virginia. In 1640 the American colonies included 48,768 whites and about 1,600 blacks. By 1790, in the first census taken by the new republic, some 3.9 million persons were enumerated, of whom 757,000 (or 19.3 percent) were black.

Both the total U.S. population and the black population have grown dramatically since that date. The black population reached 4.4 million just prior to the Civil War and doubled to 8.8 million by 1900. It passed the 15 million mark in 1950 and in the most recent, 1980 Census, 26,488,218 blacks were counted, representing 11.7 percent of the total U.S. population of 226.5 million. By July 1984, that number had increased to 28,609,000, according to Census Bureau estimates.

In the past, such growth was usually explained by natural increase. That is to say, among black Americans, births have always considerably outnumbered deaths, reflecting both a relatively high birth rate and a young population. In more recent years, immigration has become an increasingly important factor in the growth of the black population of the U.S. and should always be considered whenever changes in that racial group are examined.

### Black Migration: A Brief History

To be sure, today's black population results entirely from earlier migration—both voluntary and involuntary. There is no consensus on the total number of involuntary migrants. The slave trade between Africa and the Americas resulted in "an estimated 9.6 million slaves [being] transported to the New World from 1651 until the abolition of slavery in the nineteenth century. . . . This was the greatest slave migration in history in terms of distance and numbers moved." Clearly, a portion of that number came to the Colonies and later the United States.

Voluntary immigration by blacks to the United States has been taking place since late in the 19th century, when movements from the West Indies began increasing in numbers. Nevertheless, until recently the issue of their proportion of the total black population has largely been overlooked.

Not only have numbers increased, but the source of the black immigration has shifted dramatically

An ever-growing proportion of the black U.S. population consists of persons of foreign birth. In the 1980 Census, 815,720 foreign born were counted, representing 3.1 percent of the total black population, the highest proportion ever recorded. This reflects the fact that the immigration level for blacks has increased considerably in recent years, particularly since the changes in U.S. immigration law in 1965, which took effect after 1968.

As race is not tabulated in reports from the Immigration and Naturalization Service (INS), it is not possible to determine the exact number of black immigrants. We have examined country of origin statistics for the 1954-1984 period and made tentative assumptions based on the racial composition of these countries of origin. Clearly, the majority of black immigrants come from the West Indies. The second largest group of foreign-born blacks are originally from Africa, followed by South America and Central America.

In 1954 only about 5,000 blacks immigrated to the U.S. As recently as 1970, they still numbered fewer than 50,000. For the five-year period 1980-1984 the average annual number moving to the U.S. has hovered around 80,000. By 1984, the most recent year for which statistics are available, the number amounted to 83,138.

Not only have numbers increased, but the source of the immigration has shifted dramatically. For example, between 1968 and 1984, the number of immigrants from predominantly black African countries has grown from 1,537 to 10,267 per year—an almost sevenfold increase in just 16 years. As a result, the proportion of all black immigrants coming from Africa has grown from 3 percent in 1968 to almost 10 percent in 1984. The number coming from Ethiopia increased from 95 to 2,461, and those from Nigeria rose from 187 to 2,337. In addition, immigrants coming from Guyana increased from 1,148 in 1968 to 8,412 in 1984.

As a result of these demographic shifts, black Americans may be entering a new era and facing challenges reminiscent of those faced by the WASP majority of the white population in the late 19th and early 20th centuries.

### Projecting Future Immigration

With that in mind, we have developed projections of the black population for the next 50 years to get some idea of the growing impact of black immigration on the total black population of the nation.

First, we must separate the black population into two groups: native born and foreign born as of the 1980 Census. We then make assumptions about their fertility and mortality behavior. For both, we assume that the average number of children per woman will drop from 2.3 to 1.8 by 2030—the latter was the fertility rate for the total U.S. population in 1980, and there is some evidence that convergence is taking place.

We assume similar convergence pat-

John Reid is professor of sociology at Howard University.

terns in mortality with both groups exhibiting declining infant mortality and increasing life expectancy in future years, eventually approaching that for the entire nation. By using similar rates for both the native-born and foreign-born, we can better illustrate the impact of immigration per se on the total black population.

The table below shows the alternative projections of the black population under different immigration assumptions. If recent immigration levels are maintained for the foreseeable future (about 75,000 per year), the population will reach 35 million by the year 2000 and 44 million by 2030. Should immigration increase to 100,000, the total black population in those years would be somewhat larger: 36 million and 45 million, respectively.

Clearly we are at the onset of a new era, one in which many different cultures will be competing with each other.

## U.S. Black Population, 1980-2030, by Levels of Immigration (in thousands)

A: Annual Net Immigration of 75,000

| | 1980 | 1990 | 2000 | 2010 | 2020 | 2030 |
|---|---|---|---|---|---|---|
| Native Born | 25,900 | 30,427 | 32,717 | 35,296 | 37,261 | 38,240 |
| Foreign Born | 486 | 1294 | 2740 | 3709 | 4687 | 5607 |
| Total | 26,386 | 31,721 | 35,457 | 39,005 | 41,948 | 43,847 |
| % For. Born | 1.8 | 4.1 | 7.7 | 9.5 | 11.2 | 12.8 |

B: Annual Net Immigration of 100,000

| | 1980 | 1990 | 2000 | 2010 | 2020 | 2030 |
|---|---|---|---|---|---|---|
| Native Born | 25,900 | 30,427 | 32,717 | 35,296 | 37,261 | 38,240 |
| Foreign Born | 486 | 2072 | 3320 | 4644 | 5905 | 7146 |
| Total | 26,386 | 32,499 | 36,037 | 39,940 | 43,166 | 45,386 |
| % For. Born | 1.8 | 6.4 | 9.2 | 11.6 | 13.7 | 15.7 |

Note: See text for methodology.

More important than sheer numbers for future years is the proportion of the total black population composed of foreign-born blacks and their descendants. With immigration limited to 75,000 per year, by the turn of the 21st century 7.7 percent of the black population will be comprised of the foreign born and their descendants. By 2030, close to 13 percent will fall into that category. Raising the immigration level to 100,000 per year, a very plausible possibility, would of course result in a larger proportion of the black population being either foreign born or the children of foreign born: 9.2 percent at the turn of the century and 15.7 percent 30 years later.

Within the next half century, in short, the U.S. black population will consist not only of the vast majority who are descended from slaves, but also of a growing group who are not descendants of slaves. Within the next 50 years, just those black immigrants who arrived in 1980 or later and their U.S.-born descendants will make up 10 to 13 percent of the black population. And this does not include blacks in the U.S. born before 1980 who are not slave descendants.

Black Americans face a new challenge, reminiscent of that faced by white Americans at the turn of the 20th century when millions of Southern and Eastern Europeans immigrated here. Conflict situations arose as the many groups competed among themselves for the benefits offered by the dominant WASP group; hostilities developed between ethnic groups and are present, albeit below the surface, to this very day.

For American blacks, this is a new situation, where numerous ethnic groups within the racial group will be competing for what little the white power structure offers them.

We have long been accustomed to the English-speaking West Indian population. Today's immigrants speak many different languages, including French Creole, Spanish, Portuguese, Swahili, and other African dialects.

Clearly we are at the onset of a new era, one in which many different cultures will be competing with one another, and hopefully working together as blacks to succeed in this nation. Fortunately, we can benefit from the earlier experiences of the white population as we adjust to this new situation. In this way, hostilities between the long-

*Continued on next page*

## Demographer's Page

*Continued from preceding page*

standing and more recent black residents can be kept to a minimum.

Will the newest immigrants be assimilated into the overall black American society or will cultural enclaves continue to exist?

Some blacks would prefer what has been called a "status quo" society, a continuation of the present pattern of coexistence. Others see future demographic changes as marking the onset of a new phase in the changing black American society—a "multicultural" black society. What direction will be followed not only depends on the intensity of the demographic behavior but on the mode that cultural assimilation will take in future years—in the family, community, schools, workplaces, and churches—indeed, in all the social institutions of the black society.

### References

1. Karl E. Taeuber and Alma F. Taeuber, "The Negro Population in the United States," in John P. Davis, ed., *The American Negro Reference Book* (Englewood Cliffs, N.J.: Prentice-Hall, 1966), p. 100.
2. Edmund K. [illegible], *The [illegible] Tenth of the Nation* (New York: [illegible], 1984), p. 101.
3. Leon F. Bouvier and Cary B. Davis, *The Future Racial Composition of the United States* (Washington, D.C.: Population Reference Bureau, 1982).

**POSITIONS/ PROFESSIONALS**

**Program Officer.** International Projects Assistance Services, a nonprofit North Carolina-based organization seeks individual knowledgeable in international family planning program development with excellent writing and interpersonal skills. *Qualifications:* degree in public health or related field preferred; some field experience necessary. *Salary:* Moderate; send resume with salary history. *Contact:* Katie L. McLaurin, Acting Executive Director, IPAS, PO Box 100, Carrboro, NC 27510.

## Population Vistas

*Continued from Page 3*

- The list of the most populous countries will continue to change, reflecting the long-term population surge in the LDCs. On the list of larger-than-you-might-think countries as of 2025 (ranked no. 12) Ethiopia, 111 million; (no. 13) Vietnam, 105 million; (no. 14) the Philippines, 102 million; (no. 15) Iran, 96 million; and (no. 16) Turkey, 92 million (medium variant projections).
- Finally—according to UN staff, the medium variant projection shows that in 2025, as lower fertility has its effect, the age *structure* of the less developed world will be almost identical to that of the more developed world in 1950, albeit over eight times larger. —A.H.

**Growth rate**

| [illegible] | [illegible] | [illegible] | [illegible] | 2010-15 | 2020-25 |
|---|---|---|---|---|---|
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.96 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 1.29 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.62 |

[illegible]

| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2020-25 |
|---|---|---|---|---|---|
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 1.10 |
| [illegible] | [illegible] | [illegible] | [illegible] | 1.64 | 1.44 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.74 |

[illegible]

| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2020-25 |
|---|---|---|---|---|---|
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.29 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.55 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 0.01 |

**Total Fertility Rate**

| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2020-25 |
|---|---|---|---|---|---|
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2.4 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2.7 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2.0 |

[illegible]

| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | 2020-25 |
|---|---|---|---|---|---|
| med. var. | [illegible] | [illegible] | [illegible] | 2.7 | 2.4 |
| high var. | [illegible] | [illegible] | [illegible] | 3.0 | 2.8 |
| low var. | [illegible] | [illegible] | [illegible] | [illegible] | 2.0 |

[illegible]

| Countries | [illegible] | [illegible] | [illegible] | [illegible] | 2020-25 |
|---|---|---|---|---|---|
| med. var. | 2.0 | 2.0 | 2.0 | 2.1 | 2.1 |
| high var. | [illegible] | [illegible] | [illegible] | [illegible] | 2.3 |
| low var. | 1.8 | 1.8 | 1.8 | 1.9 | 1.9 |

## SOFTWHERE

**Life** is a public domain game in which colonies of imaginary "cells" live through innumerable generations of growth and decline. Invented by British mathematician John Conway some 15 years ago, "Life" not only pertains to mathematical theory but also provides some population insights.

The rules are simple. Imagine generations of cells living on a grid. From generation to generation, only cells bordering on two or three other cells survive; the rest die, from either too little contact with other cells (i.e., they border on one or none) or too much (they border on four or more). Where exactly three cells border on an empty space, a new cell is born.

That's all. Yet when put through a personal computer, "Life's" patterns of reproduction and the devastating effect of changing just one cell in a colony (which may contain dozens or hundreds of cells) have proven endlessly fascinating to mathematicians and computer hackers. Of greatest interest to "Life" devotees has been the search for patterns that resist disintegration and even multiply (the immortal "gliders" and their progenitors, the "glider guns").

Particularly during the 1970s, there was a flurry of "Life" articles and even a "Life" newsletter (see Martin Gardner's new book, *Wheels, Life, and Other Mathematical Amusements*, for a detailed history). Whatever implications "Life" may have for population studies, biology, or mathematics, it is very likely, as master hacker Steven Levy once opined, "the deepest of all computer games."

"Life" can be found on computer bulletin boards in various versions. It is also available (for either Apple II or IBM PCs) for $10 per disk from Public Domain Software Copying Co., 33 Gold St., #L3, New York, NY 10038. 212-732-2565

## WORLD FOOD NEWS

The Food and Agriculture Organization (FAO) of the UN is preparing an in-depth study of agricultural and food problems of Africa. It will be presented at the FAO's Regional Conference for Africa to be held in Brazzaville, Congo, in September. Initial phases of the study included a meeting of 30 development experts at FAO headquarters in Rome last month.

FAO Director-General Edouard Saouma told the gathering that [illegible] of Africans must be considered part of a consolidated [illegible]. He said it [illegible] the process of [illegible] broad range of [illegible] [illegible].

The in-depth study is part of a longer term program aimed at putting African agriculture on a sustainable growth path. In departure from previous assessments, it is more concerned with *how* to implement policies and also considers Africa's problems at the subregional—rather than continental—level, taking into account the ecological diversity ranging from desert to evergreen equatorial forest. Formulation of the study comes during a period of evolution in FAO's programs in which it is now devoting almost 50 percent of its resources to support food and agricultural production in Africa.

*World Food News* is prepared by the [illegible] Office of the Food and Agriculture Organization of the United Nations.

## POPULATION UPDATE

### Estimated United States Population

As of September 1, 1985 [illegible]
As of September 1, 1984 [illegible]

[illegible]

### Estimated World Population

As of January 1986 [illegible]
Annual growth [illegible]

[illegible] PRB's 1985 [illegible]

### Latest Provisional Statistics for the U.S.: September 1985

| | 12 months ending with September | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | [illegible] | [illegible] | [illegible] | 15.5 | 15.8 | 15.9 |
| Deaths | [illegible] | 2,033,000 | 8.6 | 8.6 | 8.6 | 8.6 |
| Natural increase | [illegible] | 1,626,000 | 7.0 | 6.9 | 7.2 | 7.3 |
| Marriages | 2,427,000 | 2,462,000 | 10.2 | 10.3 | 10.6 | 10.7 |
| Divorces | 1,180,000 | 1,159,000 | 5.0 | 4.9 | 5.1 | 5.2 |
| Infant deaths | [illegible] | 39,100 | 10.4 | 10.7 | 10.9 | 11.4 |
| Population base (millions) | | | 237.8 | 235.6 | 233.2 | 231.0 |

Note: Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

Source: *Monthly Vital Statistics Report* (Vol. 34, No. 9) from the National Center for Health Statistics.

# TAKE A NUMBER

**Latest Fertility Rates:** Developed countries continued to show decreases in their total fertility rates (TFR) or give little evidence of any tendency to rise from record low levels. These rates, reported in the latest issue of *Population*, also show that the birth rates of most countries of Eastern and Southern Europe continue to converge with the very low rates prevailing in their northern and western neighbors.

In Romania, the TFR was reported as 2.0 lifetime births per woman in 1983, which means that Romanian fertility has dropped below the "replacement level" of about 2.1 for the first time since the outlawing of abortion in 1966. Irish fertility now also shows a trend in the line, down to a 2.74 TFR in 1983 from 2.96 in 1982. The following countries showed small decreases in fertility from the year before: 1984: Austria 1.54; 1983: Belgium 1.56, Ireland 2.24, Netherlands 1.47, the U.K. 1.77, Switzerland 1.51, Greece 1.93, Italy 1.53, Portugal 1.96, East Germany 1.79, Bulgaria 2.00, Canada 1.68, the U.S. 1.80 and New Zealand 1.92; 1982: Spain 1.87; 1981: Yugoslavia 2.06. Most of these decreases were quite small, of course, with Spain's falling the most, a drop of 0.12 from 1981 to 1982.

Increases in TFR were noted in the following countries: 1984: Denmark with a TFR of 1.40, Hungary 1.73 and Czechoslovakia 2.09; 1983: France 1.81, Poland 2.40, the USSR 2.37, Finland 1.74 and Israel 3.14; 1982: Japan 1.75.

Many of these changes are quite small and often result from changes from year to year in the timing of births, while in other cases real declines in fertility are suggested. (With the above, this column really earns its name!)

**Agrarian Demographics:** After its long, steady decline, the U.S. farm population may have stopped shrinking. In the 1980 Census, the farm population was 6.1 million. The Census Bureau's estimate for 1984 from the *Current Population Survey* indicates that the farm population seemed to be leveling off at about 5.8 million. The farm population is defined as persons living on farms in rural areas, farms being places with customary annual sales of agricultural products of $1,000 or more.

**South and West still growing:** The U.S. population increased by 5.4 percent, or 12.2 million, in 1980-1985, for a 1985 total of nearly 239 million, according to new Census Bureau estimates. The South grew by 8.6 percent and added 6,500,000 people. The West grew by 10.8 and added 4,654,000. Together, the two regions accounted for 91 percent of national population growth.

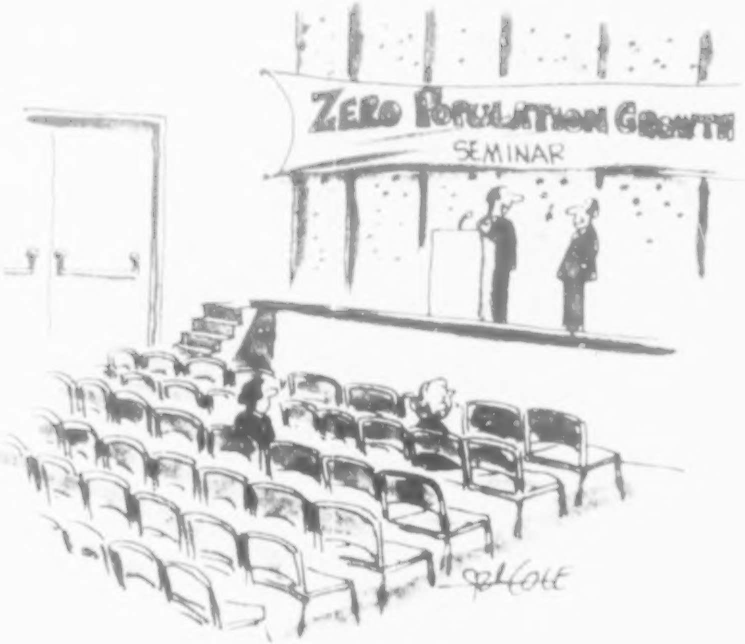
In the same period, the Northeast grew modestly (1.5) and the Midwest grew very little (0.1).

The 10 fastest growing states were Alaska (29.7 percent), Arizona (17.2), Nevada (16.9), Florida (16.6), Texas (15.0), Utah (12.6), Colorado (11.8), California (11.4), New Mexico (11.1), and Georgia (9.4).

Five states have lost population since 1980 — Iowa (−0.1), Michigan (−1.9), Ohio (−0.5), Pennsylvania (−0.1), and West Virginia (−0.7) — as well as the District of Columbia (−2.0).

**Here and There...:** For the 12 months ending with September 1985, the U.S. infant mortality rate was 10.4 infant deaths per 1,000 live births, the lowest in history for a 12-month period and the first time that it has rounded to 10. ... The effect of high population growth can be seen in the age structure of Kenya where the 25-29 year age group numbered 984,000 while those 0-4 were 3,900,000 in 1983. C.H.

# ADDENDA



Nice Crowd

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St. N.W., Washington, D.C. 20005.*

**AN ENGLISH CHINESE DICTIONARY OF DEMOGRAPHY,** by Xueyuan Tian, Zhaoxiang Liu, Xiuke Xu, Liqun Cao, and Pechao Chen. Beijing: New World Press (24 Baiwanzhuang Road, Beijing, China), 1985. 446 pages.

This dictionary is primarily geared to Chinese speakers reading the demographic literature in English. It contains 6,000 entries and covers most standard demographic terms (such as de jure, de facto, SMSA, and age-heaping) and vocabulary from related fields (such as reproductive biology, family planning, economics, and sociology) and the names of many international population organizations (including PRB).

There are a few problems with this dictionary. One is the limited usefulness of the pinyin-romanized list of demographic terms. A second is that its format is less a dictionary than an index of demographic vocabulary. However, this book is still a welcome addition to the field. With increasing contacts between Western and Chinese demographic communities, it will undoubtedly prove useful to both Chinese demographers working with demographic literature in English, as well as to those American demographers who speak Chinese and need to communicate in that language with Chinese demographers.

*—Nancy E. Riley*

*—Yuan Zhao*

**FILTERS AGAINST FOLLY,** by Garrett Hardin. New York: Viking, 1985. 240 pages. $15.95. ISBN 0-670-80410.

Hardin argues that to understand the world and the consequences of our actions adequately we must use three filters: literacy—what are the words?; numeracy—what are the numbers?; and (a Hardinism) ecolacy—and then what? All three, he argues, are necessary for a sound understanding of any issue.

Hardin remains controversial and irascible as ever, e.g., his well-known concern about overpopulation: "Overpopulation favors economic inequality. The redistribution of wealth sought by ... reformers would increase population and thus secondarily increase inequalities of wealth."

He insists that ecology is conservative, but adds he does not mean the present-day "garden-variety" conservative who only "wants to preserve every societal arrangement that has in the recent past enriched some enterprisers (including himself) without asking about the total consequences of the rules by which the profits were made."

Many readers will dispute these conclusions, and Hardin himself compares our knowledge of political systems with the 16th century's rudimentary understanding of physiology before William Harvey's epochal discovery of blood circulation. "There are still worlds to be discovered," he concludes. In the meantime, his controversies and opinions are, as always, stimulating, and the reader of *Filters Against Folly* will think more clearly and carefully thereafter.

*—Leon F. Bouvier*

**THE CHANGING RURAL VILLAGE IN AMERICA,** by Harley E. Johansen and Glenn V. Fuguitt. Cambridge, Mass.: Ballinger Publishing, 1984. 258 pages. $35.00. ISBN 0-88410-692-6.

What functions do rural villages perform? Can they survive in view of changing agricultural technology, which results in changing manpower needs and thus in fewer farms and farm workers?

Questions such as these have been with us for more than 50 years. They were raised as a result of studies done at the University of Wisconsin and it is fitting that a new study should come from the same school. With a new nationwide sample of villages, and with new data and new methods of analysis, Johansen and Fuguitt again ask what functions these villages perform and what their future is likely to be. The turnover in migration patterns by which nonmetro areas grew as rapidly as metros during the 1970s is thoroughly explored.

A special feature is the detailed analysis of services lost, services gained, and those maintained. There is an analysis of promotional efforts on behalf of individual places. The relevance of theories of regional development and of central place theory is analyzed.

When will someone do a similar study of the large and growing population of rural residents (about four-fifths of the rural total) who do not live in villages?

*—Conrad Taeuber*

## Publications Received

**AFRO-AMERICAN DEMOGRAPHY AND URBAN ISSUES: A Bibliography,** compiled by R.A. Obudho et al. Westport, Conn.: Greenwood Press, 1985. 433 pages. $49.95.

**DICTIONARY OF DEMOGRAPHY: Biographies,** by William Petersen and Renee Petersen (2 vol.). Westport, Conn.: Greenwood Press, 1985. 1,365 pages. $125.00.

**DICTIONARY OF DEMOGRAPHY: Multilingual Glossary,** by William Petersen and Renee Petersen. Westport, Conn.: Greenwood Press, 1985. 259 pages. $100.00.

**HUMAN ECOLOGY AND ETHICAL RELIGIOUS VALUES,** by Pedro C. Beltrao, S.J. Rome: Pubblicazioni e Documenti della Facolta di Scienze Sociali della Pontificia Universita Gregoriana. 343 pages. $17.00.

**THE FOURTH WAVE: California's Newest Immigrants,** by Thomas Muller et al. Washington, DC: The Urban Institute Press. 217 pages. $19.95.

**MEXICAN-AMERICANS IN COMPARATIVE PERSPECTIVE,** edited by Walker Connor. Washington, DC: The Urban Institute Press. 173 pages. $30.00.

**WIVES AND DAUGHTERS: The Women of Sixteenth Century England,** by Kathy Lynn Emerson. Troy, NY: Whitston Publishing, 1984. 407 pages.

**WOMEN AND CHANGE IN LATIN AMERICA,** by June Nash et al. South Hadley, Mass.: Bergin & Garvey Publishers, 1985. 373 pages.

**WOMEN IN THE URBAN AND INDUSTRIAL WORKFORCE: Southeast and East Asia,** edited by Gavin W. Jones. Distrib. by Univ. of Hawaii Press, Honolulu, Hawaii, 1984. 435 pages. $19.50.

# SPOTLIGHT

## CONNECTICUT

Population (1984 est.): 3.15 million
Births per 1,000 pop.(1983): 12.7
Deaths per 1,000 pop.(1983): 8.5
Land area: 4,872 sq. miles
Population per sq. mile (1984): 647.4
Rate of natural increase (1983): 0.96 percent
Percent born in Connecticut now residing there: 58
GNP per capita (1983): $14,826
Capital: Hartford

by Leon Yacher

Connecticut may be the third smallest U.S. state in area, but it has the 27th largest population, and ranks fourth in population density.

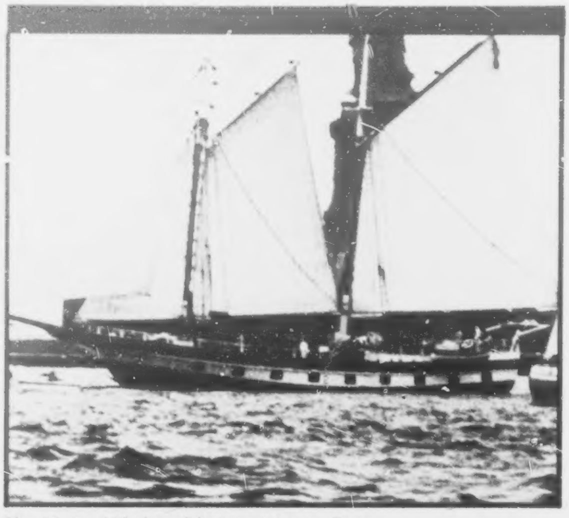
The main agricultural area of Connecticut is located along the central valley, though urban areas are encroaching on farm land as areas surrounding the state's cities become more populated. The coastline is narrow and mostly settled, especially in the western part of the state. Much of the population is distributed along the central valley and the coast. Connecticut is divided into 169 towns. It used to consist of 8 counties, and though county governments were abolished in 1960, the counties prevail today in spirit, mostly for historical custom and statistical purposes.

Specifically, the 1984 estimated population in Connecticut was 3,154,221 people, growing at a rate of 0.37 percent each year since 1980. The growth between 1970 and 1980 was 2.48 percent (the U.S. as a whole grew 11.4 percent that decade).

Like the U.S. as a whole, Connecticut is highly urbanized. A total of 74.3 percent of the people residing in the state live in urbanized areas, while only 0.2 percent are farm residents. Despite such an urbanization pattern, the state's largest cities decreased in population during the 1970-1980 decade, a loss which continues today. Hartford, Connecticut's capital and largest city since 1930, was topped in population by Bridgeport in 1980. Both of these cities lost population during the 1970s, as did the next three largest cities, New Haven, Waterbury, and Stamford. According to 1984 estimates, this downward trend for Connecticut's largest cities continued.

High growth is occurring, however, in areas surrounding the state's cities. This is particulary true in Fairfield County, whose border is located next to New York State and within commuting distance from New York City. These bedroom communities are providing not only the necessary housing for the central cities, but themselves are becoming attractive relocation centers for large corporations moving their headquarters out of pricey New York City. These corporations are moving in search of a more advantageous milieu; not only are Connecticut's suburbs less high-priced, but they can provide an improved ambience for the corporate population, many of whom are already area commuters. Examples are General Electric's move to Fairfield, and Union Carbide's move to Danbury, which became especially attractive to population with the completion of Interstate 84, and whose PMSA grew by 5.8 percent from 1980 to 1984, the state's highest rate.

Though Stamford, located 35 miles from Manhattan, has lost population, it has been a real winner in attracting corporations. Some towns near Stamford have also lost population, but the outer hinterland of Stamford has grown faster than other areas of the state. Real estate prices in Stamford and neighboring towns make it one of the most expensive areas in the U.S. In the state's eastern part, and especially on the coast, many small towns have also grown dramatically. At the aggregate level, between 1970 and 1980, counties with smaller populations grew at higher rates than counties with larger populations. The pattern is continuing at present. Hartford County displayed a population loss between 1970 and 1980, though as of 1984 a modest reversal has been noted.


The *Mystic Whaler*, of historic Mystic, Conn.

Connecticut's population is not particularly old, with a median age of 28.6. The state's population under 15 years of age is 20.8 percent, compared with the U.S. average of 22.6 percent, while 11.7 percent (U.S.: 11.3) of the population is 65 years of age or older. Birth rates have increased slightly from 12.4 per 1,000 in 1979 to 1983's rate of 12.7 per 1,000. Immigration is an important factor in Connecticut, where 8.5 percent (compared to 6.2 percent nationally) of the population is foreign born. At present, Mexico is the leading country supplying immigrants into the state.

Economically, the state relies on manufacturing; 30.4 percent of the population works in this industry. Only 1 percent of the labor force is employed in agriculture. For the future, Connecticut can continue to expect corporate influx, as the tax base is very favorable for long term relocation. The state does not have an income tax, and introduction of such is unlikely in the forseeable future.

Leon Yacher is assistant professor of geography, Southern Connecticut State University.

# POPULATION TODAY

Vol. 14, No. 3 March 1986

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# FROM THE EDITOR'S DESK

It's been cropping up every year lately. What to do about the "year 2000"? Or 2000. Or '00. Or whatever. This must be a question plaguing statisticians and prognosticators everywhere. For years, 2000 has been like a comfortable old quilt. Since we have very few sound ideas about the world's future, statistically, economically, or otherwise, why not project things to a nice, round "benchmark"?

Like 2000, which has always seemed like a natural target date. Not only does it end a millennium (or bi-millennium—at any rate 2,000 big ones), but two-oh-anything always has a futuristic ring when struck with a hard object.

Why bring all this up when the world has other, larger problems? Because 2000 is getting too close.

Each year, when we prepare the *World Population Data Sheet*, a great deal of PRB discussion centers on just what information should be included. How we fuss and worry. Population projections are obviously high on the list of *Data Sheet* users' needs, but for what year? In recent times, 2020 projections have appeared along with 2000, in recognition of the fact that there is probably life beyond the 20th century. But when should 2000 be dropped? 1999? 1998? 199—?

On the one hand, 14 years in the future is only a wink of the eye away, demographically speaking. Only the most radical changes in birth and death rates could have any significant effect on population size by 2000, so . . . why not drop it?

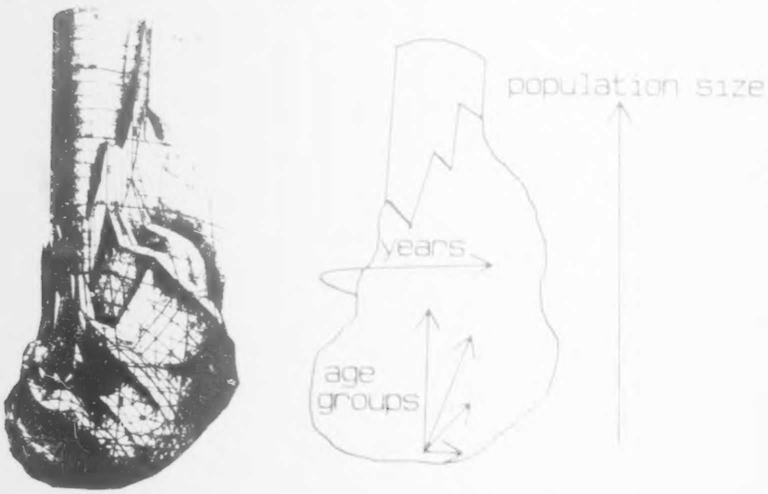
On the other hand . . . "the year 2000"—what a magical incantation! Not to mention that however close demographically, 14 years in the future is still far over the horizon for specialists in such fields as economics, labor force, and the environment.

Thus, the question for those of you who use the *Data Sheet*: When should we drop the year 2000 and what years should we show in its place? 2010? 2015? 2020? Or what? Please drop a line and tell us; we'd really like to know.

*Carl Haub*
*Demographic Editor*

# SPEAKING GRAPHICALLY

from "Graphics in Demography" by [illegible]



1. Perozzo's figure, published in 1881, shows a cylinder with a vertical axis. Each vertical cross section of the cylinder represents a particular year. Within each cross section the age groups radiate out from a common, low center. The higher the angle of the protrusion, the younger the age group. The higher the end of the protrusion, the more populous the age group. The cross sections are arranged in a fan around the central cylinder in chronological order, bulging higher in more recent years (toward the right). Staring at Perozzo's castle in the air, the reader can gain insight into the age structure of Swedish men from 1750 to 1825, or at least realize that mind-bending graphic illustration existed long before electronic computers.

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# Links Between Population and Economic Growth

What role does slower population growth play in improving standards of living for people of the world's less developed countries (LDCs)? Overall, "slower population growth would be beneficial to economic development for most of the developing world," according to the National Academy of Sciences (NAS), which was commissioned by the U.S. Agency for International Development (AID) to assess the current population situation in light of today's continuing debate about population growth.

The annual rate of population growth for the LDCs was 2.1 percent in 1950-1955; it peaked at 2.55 percent in 1965-1970; and by 1980-1985 it had fallen to 2.0 percent. Sustained population growth of this magnitude is unprecedented in history, and reflects the dramatic fall of mortality rates after World War II, combined with consistently high fertility rates.

Before the 1980s, high rates of population growth were almost universally regarded with trepidation. Given the limits of the earth's resources and the extended period of child dependency, the negative effects of rapid population growth seemed self-evident. As such, the issue was not the subject of a great deal of research. Early reports, among them Ansley Coale and Edgar Hoover's 1958 book, *Population Growth and Economic Development in Low-Income Countries*, along with the NAS-sponsored 1971 work, *Rapid Population Growth: Consequences and Policy Implications*, found seriously negative economic consequences of rapid population growth. This pessimistic view was most recently presented in the widely publicized *Global 2000 Report to the President* in 1980.

## Rise of Revisionism

This negative view of population growth has been questioned in the 1980s, as it has become clear that despite rapid population growth, developing countries have achieved unprecedented levels of per capita income, literacy, and life expectancy over the past quarter century.

Julian Simon's 1981 book, *The Ultimate Resource*, challenged conventional wisdom by arguing that population is an important long-term stimulus to economic advancement through its effects on productive technology, the pace of innovation, the formation of markets, and governmental infrastructural investments. Simon's book received a good deal of publicity among scholars and the general public alike, and has been warmly received by the present Administration.

> The NAS report generally portrays slower population growth as a positive factor in development.

Against this background, AID asked the NAS to undertake a new assessment. The work, funded by private sources as well, represents an extensive effort to synthesize the recent research on the economic consequences of population growth. The Working Group on Population Growth and Economic Development of NAS's Committee on Population prepared the report, which was issued this month, and encompasses two volumes: the first, *Population Growth and Economic Development: Policy Questions*, summarizes much recent research. The second, *Population Growth and Economic Development: Background Papers*, contains the 17 commissioned papers on important aspects of economic-demographic relations.

## Grappling with the Tricky Ones

In carefully worded language, the report addresses nine currently debated questions regarding various aspects of the population/development link. These questions run the gamut from whether or not slower population growth would increase the growth rate of per capita income by increasing per capita availability of resources (both exhaustible and renewable) to whether lower population densities lower per capita income because of reduced incentives for technological innovation and inability to take advantage of economies of scale. The report also addresses the effect of a couple's fertility behavior on society at large.

In general, slower population growth is portrayed as a positive factor in achieving development, though the report identifies a few positive aspects of population growth, for example, its role in stimulating conservation (see below). However, the report repeatedly stresses that rapid population growth can exacerbate the ill effects of a variety of policy failures, including urban bias, direct and indirect food subsidies which distort agricultural markets, credit market distortions, and inadequate common property management.

A sampling of the study's conclusions:

- Slower population growth may delay the time at which a particular stage of depletion of an exhaustible resource is reached. Though it seems

*Continued on page 8*

# Where Are the World's 10 Million Refugees?

## MAIN GROUPS OF CURRENT, UNSETTLED WORLD REFUGEES BY COUNTRY OF ASYLUM

AFRICA

**Angola.** 70,000 refugees from Namibia, 13,000 from Zaire, 9,000 from S. Africa
**Benin.** 3,600 refugees from Chad
**Botswana.** 1,600 refugees from Zimbabwe
**Ethiopia.** 72,000 refugees from Sudan
**Lesotho.** 11,500 refugees from S. Africa
**Nigeria.** 4,000 refugees from Chad
**Senegal.** 5,000 from Guinea-Bissau
**Somalia.** 700,000 Ethiopians
**Sudan.** 484,000 Ethiopians, 200,000 Ugandans, 5,000 refugees from Zaire, 3,000 from Chad
**Swaziland.** 6,000 refugees from S. Africa
**Tanzania.** 153,500 refugees from Burundi, 15,000 refugees from Zaire, 2,500 from Rwanda, and 7,000 from other countries
**Zaire.** 265,000 refugees from Angola, 20,000 from Uganda, 15,000 from Burundi and Rwanda, and 30,000 from Zambia and other countries
**Zambia.** 75,000 refugees from Angola, 9,500 refugees from Zaire, 7,000 from Namibia, 2,500 from S. Africa
**Zimbabwe.** 30,000 from Mozambique

ASIA

**Hong Kong.** 10,734 Indochinese
**Indonesia.** 7,890 Indochinese refugees
**Malaysia.** 9,155 Indochinese refugees
**Thailand.** 127,476 Indochinese refugees

LATIN AMERICA AND THE CARIBBEAN

**Costa Rica.** 16,000 refugees from El Salvador and Nicaragua
**Guatemala.** Approximately 70,000 refugees from El Salvador
**Honduras.** 38,000 refugees from El Salvador and Nicaragua
**Mexico.** Approximately 170,000 refugees from Guatemala and El Salvador

MIDDLE EAST AND SOUTH ASIA

**Jordan.** 800,000 Palestinian refugees
**Gaza Strip.** 430,000 Palestinian refugees
**Iran.** 1,000,000 refugees from Afghanistan
**Lebanon.** 300,000 Palestinian refugees
**Pakistan.** 2,500,000 refugees from Afghanistan
**Syria.** 280,000 Palestinian refugees

In the past, refugees have sought asylum primarily in Europe and other developed areas. Today, however, the majority of the world's approximately 10 million refugees are from developing countries seeking asylum in other developing countries. About 80 percent of the refugees have turned to asylum in Southeast Asia, South and East Africa, the Near East and South Asia, and Latin America and the Caribbean. These regions, termed "crisis areas" by the UN High Commissioner for Refugees (UNHCR), contain large numbers of refugees in need of protection and assistance.

**Afghan refugees.** The largest refugee population in the world today is the estimated 3.5 million Afghans currently sheltered in Pakistan (2.5 million) and Iran (1 million), caused by the Soviet invasion of 1979.

Because of its strong political and cultural ties with Afghanistan, the Pakistani government has permitted many of the refugees to work and move about without restriction. But while many of the refugees have blended into Pakistani life, the sheer numbers of refugees sheltered in some areas have contributed to a strain on resources and the economy and have created social tensions with the indigenous population. To relieve some of the financial burden, UNHCR and other international organizations are implementing various income-generating projects for the refugees to decrease their dependence on outside aid.

Although the Pakistani and Iranian governments have welcomed the Afghan refugees, they are viewed as temporary residents who will eventually return to their country. However, continued Soviet attacks on civilians in Afghanistan makes repatriation an unlikely outcome in the near future.

**Indochinese refugees.** Since 1975, about 1.6 million Indochinese have sought asylum in Southeast and East Asia. The number of refugees leaving Indochina peaked in 1979 when Vietnam's government expelled many Vietnamese of Chinese descent. As of mid-1985, the number of Indochinese refugees was reduced to 160,000, mainly through successful efforts to resettle many of the refugees. A total of approximately 1.5 million refugees have found permanent homes. The U.S. has the largest number of resettled Indochinese (750,000).

**Africa.** Nearly 3 million refugees are scattered throughout Africa, including over 1 million Ethiopians — the single largest group — currently sheltered in Sudan and Somalia. Continued fighting between government forces and liberation movements, as well as severe drought, have pushed these people from their homes.

Sudan and Somalia, like most African nations, have a generous policy of granting temporary asylum to those who seek it. The large number of refugees settled in these countries has major social, political and economic implications for their development.

In Somalia, one of every eight persons is a refugee. Even with assistance from UNHCR, the extra inhabitants put a strain on the country's economy: the per capita GNP of Somalia is US$282. Resources are strained and development projects have suffered. *RC*

# The U.S. Reaches 240 Million

The United States is now a nation of 240 million people.

As of Nov. 1, 1985, according to unreleased Census Bureau estimates, the U.S. population reached 240,123,000. ("Population Update" on page 9 reprints the latest *published* estimate, which is for Oct. 1.)

When the most recent Census Bureau estimates were prepared, the U.S. was growing at about 215,000 people per month (166,000 in natural increase, i.e., surplus of births over deaths, and 50,000 net immigration). The Bureau's estimates take into account estimated emigration of 160,000 per year, and net undocumented immigration of 200,000 per year. The population total includes armed forces overseas.

These rates give the U.S. a growth rate of about 1 percent annually, fairly high for a more developed country (e.g., the United Kingdom's growth rate is 0.1 percent). At these rates, the U.S. would add about 1 million people every five months, and reach the quarter billion milestone about 1990.

# The Netherlands: No More Censuses?

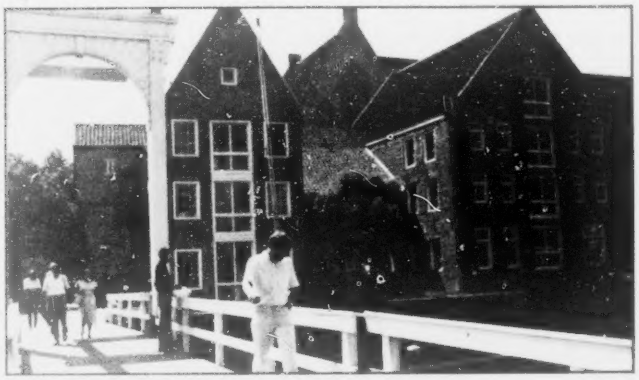
A population census every 10 years – that was the stipulation of the Census Law of the Netherlands of April 22, 1879. For almost a century, excepting the period of World War II when the 1940 Census was delayed until 1947, the Netherlands' census schedule was faithfully adhered to.

Then, with the coming of the 1971 Census, grassroots census resistance started to build – resistance to a government considered by some to be rather too inquisitive and too prone to prying into the lives of its citizens. The specter was raised, not for the first time, of Jews and resistance workers being rounded up during the war by German occupation forces who had access to perfectly organized and updated population registers, and this touched a note of sympathy in many.

A new Census Law was adopted on July 9, 1970. It contained many more regulations and safeguards than the previous one (for example, all census information containing names and addresses was to be destroyed by a specific date) but that did not allay everyone's fears. The number of persons who ultimately refused to cooperate or "were not at home" during the 1971 Census exceeded 50,000, and many more did not answer the questions as truthfully as the law required. And the number of refusers alone – 23,000 – was too large to prosecute and fine or jail.

In 1979, with the time nearing for the

*Continued on page 10*



Traditional houses in Zwolle, The Netherlands

## SURVEY REPORT

### Morocco

The Kingdom of Morocco sits astride the northwest corner of Africa, separated from Europe by the Straits of Gibraltar. The country covers an area about that of the states of Washington and Oregon combined and also lays claim to the former Spanish colonial areas of Western Sahara to the south. This claim is generally not recognized by other countries.

Morocco's 1982 Census counted 20,419,555 inhabitants, a figure seen as surprisingly low by some observers. This may be due to the country's slowly decreasing birth rate. The government has set a definite goal for a rate of 35 births per 1,000 population by 1985, down from 53 in the late 1950s. The policy does seem to have worked, although that specific target may not have been met.

Agriculture is a mainstay of the economy, with about one-half of the work force engaged in it. There are two distinct sectors in the agricultural economy: large efficient farms irrigated with government subsidies and earning export capital and smaller, less efficient family plots located on more marginal land.

As a part of its effort to gather demographic data, Morocco has taken several surveys, the most recent of which is the Contraceptive Prevalence Survey (CPS) of 1983-1984. As with other CPSs, this survey was taken by a national agency, the Public Health Ministry, with the assistance of Westinghouse Health Systems and funding from USAID.

The survey indicates that knowledge of contraception is quite high in Morocco. About 90 percent of the ever-married women interviewed said that they had heard of a method, with the pill receiving the most recognition. About 40 percent of the women said that they were using a modern method; an additional 5 percent were using a traditional one such as rhythm. This represents a 53 percent increase in contraceptive prevalence since the last survey, conducted in 1980.

The surveys are, however, somewhat inconclusive about what effect this prevalence may have had upon national fertility levels. The total fertility rate is around 5.0-5.5 births per woman, and estimates given in the survey do suggest that there was very little actual drop in fertility, despite the increased use of family planning. At the time of the 1980 survey, 12.3 percent of the respondents were pregnant, while the corresponding figure for the 1983-1984 CPS was 13.5.

When questioned as to their future fertility plans, two-thirds of the women in urban areas said that they did not wish to have any more births, and slightly less than half of those in rural areas stated likewise. This varied with many factors, as expected; about half of those with 3 living children said that they did want additional future births. *CH*

# DEMOGRAPHER'S PAGE

## Geographical Polarization of Whites and Minorities in Large U.S. Cities: 1960-1980

by Morton D. Winsberg

The 38 largest Standard Metropolitan Statistical Areas (SMSAs) in the United States, those with 1 million or more inhabitants, held 40 percent of the nation's population in 1980, the same as they did in 1960.* During this 20-year interval, these SMSAs share of the nation's non-Hispanic white population remained a constant 38 percent.

The share of the nation's minorities within these SMSAs, however, increased dramatically during this period. This has occurred because of rural-urban migration and migration from overseas. Whereas in 1960 the 38 areas held 42 percent of the nation's blacks, by 1980 the share had risen to 51 percent. During the same period the percentage of the nation's Hispanics living in these cities increased from 57 percent to 60 percent and Asians (here defined as people from South, Southeast, and East Asia) rose from 34 percent to 50 percent.

During the same 20-year period, the percentage of non-Hispanic whites fell proportionately from 84 to 73 percent of these SMSAs populations, and in seven SMSAs the group's absolute numbers fell. In contrast, between 1960 and 1980, minority groups increased their share of these SMSAs population – blacks from 11 percent to 15 percent, Asians from 1 percent to 3 percent, Asians from 1 percent to 3 percent, and Hispanics* from 2 percent to 10 percent.

### In the Central Cities

During this period also, the central cities of the 37 largest SMSAs (the 38th does not have a central city) experienced a shift of population to the suburbs. In 1960, these central cities held half the total population of their SMSA; by 1980, despite considerable annexation of suburbs by some central cities, the central cities share of their SMSAs inhabitants had dropped to 39 percent.

This shift has occurred for all population groups though especially for non-Hispanic whites. Despite the much publicized return of non-Hispanic whites to the central cities, a greater share of this group can afford to live in the suburbs than can minorities, and in 1980, non-Hispanic whites constituted 50 percent or less of the total population in the central cities of 11 of these SMSAs.†

Unique among the largest SMSAs, Los Angeles saw its polarization rate fall by 6 percent

A geographical polarization has resulted, with non-Hispanic whites concentrating in the suburbs and the minorities concentrating in the central cities. This well-recognized phenomenon has been identified as underlying several critical social problems facing our large cities.

Except for Ft. Lauderdale, all the central cities of the 38 largest SMSAs experienced a decline in the share of non-Hispanic whites in the total central-city population (see table on page 7). Interestingly, the share of non-Hispanic whites in the outer city's total population also declined in all but three SMSAs (Ft. Lauderdale, Sacramento, and Tampa).

### Four Kinds of Cities

In short, data suggest that during the period 1960-1980, in most large SMSAs, minorities and non-Hispanic whites have become geographically polarized relative to one another. The rate of this polarization was calculated and appears in the table.

The calculation was done by comparing the percentage-point difference between the central and outer cities in their proportion of non-Hispanic whites in 1960 and again in 1980, and then subtracting the 1960 difference from that of 1980. In all but one case (Los Angeles, see below) the difference was greater in 1980 than in 1960, indicating increased polarization.

Since some minorities have scaled the economic ladder more rapidly than others and have easier access to the suburbs, it is appropriate to categorize the 38 SMSAs by the proportion of the three minority groups in their total population. The table divides the SMSAs into four groups of cities as of 1980: *Asian* where Asians (a small minority in most SMSAs) held at least a 25 percent share of the minority population; *black*, where blacks constituted at least 70 percent of the minority population; *Hispanic* where Hispanics made up at least half of the minority population; and *black-Hispanic* where the proportion of blacks was between 50 and 70 percent and Hispanics 25 and 45 percent.

### Little Polarization Change

Examination of the table reveals considerable differences between the four groups of cities in rates of polarization between non-Hispanic whites and minorities in 1960-1980. In general (considering the great variation among cities within the same group), polarization was low in all SMSAs where minorities constituted a low percentage of the total population, i.e., Buffalo, Boston, Minneapolis, Pittsburgh, Portland, and Seattle. While the minorities in these cities grew much faster than the non-Hispanic whites during 1960-1980

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*SMSA was supplanted in 1983 by a new definition, Metropolitan Statistical Area (MSA). See PT, November 1985, for a discussion of the old and new definitions.

*In part, the reported rapid Hispanic growth was a result of the broadening of the definition of the group in 1980 to include all who identified themselves as such, instead of the 1960 definition, which was restricted to [illegible]

†Atlanta, Baltimore, Chicago, Detroit, [illegible] Houston, Los Angeles, Miami, Newark, New Orleans, San Antonio, and San Francisco.

Morton D. Winsberg is professor
of geography at Florida
State University.

polarization still was much less than that in many other SMSAs.

In addition, low polarization was evident in several SMSAs – the District of Columbia, as well as Cleveland and Houston – that contained large minority populations and large central-city outer-city differences in composition.

## High Polarization Change

In several SMSAs, however, polarization between 1960 and 1980 grew significantly while the non-Hispanic white population grew only slowly or actually declined. This suggests that the increased polarization was due to a dramatic shift of whites from the central city to the suburbs. The most extreme case is the Detroit SMSA, where the non-Hispanic white population grew 5 percent during the 20-year period while the black population (constituting 85 percent of minorities) grew by over 80 percent, due largely to in-migration from the South.

Chicago, Miami, New York, Newark, and San Antonio experienced similar increases of polarization, even though their non-Hispanic white populations decreased.

The SMSA of Los Angeles deserves special attention. Here the non-Hispanic white population fell 32 percent between 1960 and 1980 while the minority population grew by 269 percent. Yet unique among the SMSAs studied here, polarization between Los Angeles non-Hispanic whites and minorities fell by 6 percent.

This decline in polarization over the 20-year period was in great part due to a slight increase in the percentage of non-Hispanic whites living within the central city, but a sharp decline in the central city's share of blacks and Asians. There was no substantial change in the number of Hispanics living there.

## Conclusions

For polarization to decrease, either the central city has to become more attractive to non-Hispanic whites or minorities have to achieve greater affluence to permit them access to the suburbs. Substantial evidence indicates that Asians are now rapidly scaling the economic ladder and that many are moving to the suburbs. There will not, however, be a major relative shift of the group to the suburbs if large-scale immigration from Asia continues, since the central city will continue to be their reception area.

Hispanics are another group moving to the suburbs, but at a slower rate than the Asians. The proportion of this group who will be living in the suburbs in the future depends on their immigration volume, the majority of which is likely to be to the central city.

The movement of blacks to the suburbs is slower than that of the other two groups. Given the obstacles this group has faced while scaling the economic ladder, it is doubtful their suburbanization will be much more advanced in 1990 from what it was in 1980. It is also hard to imagine conditions in the central city of most large SMSAs becoming so desirable as to stimulate non-Hispanic whites to move inward from the suburbs.

### Polarization of Non-Hispanic Whites and Minorities Between Central City and Outer City: 1960-1980

| SMSA ordered by group | % Minorities in SMSA (1980) | Non-Hispanic Whites: % in total population, Central City 1960 | Central City 1980 | Outer City 1960 | Outer City 1980 | Polarization rate* (1980-1960) |
|---|---|---|---|---|---|---|
| Asian group | | | | | | |
| Minneapolis | [illegible] | 97 | 87 | 99 | 97 | +8 |
| Portland | 8 | 93 | 85 | 99 | 95 | +5 |
| Sacramento | [illegible] | 89 | 62 | 94 | 97 | +25 |
| San Francisco | [illegible] | 75 | 46 | 91 | 75 | +13 |
| Seattle | 11 | 91 | 78 | 99 | 93 | +7 |
| Group median | [illegible] | 93 | 78 | 99 | 95 | +8 |
| Black group | | | | | | |
| Atlanta | 28 | [illegible] | [illegible] | 91 | 85 | +24 |
| Baltimore | [illegible] | [illegible] | [illegible] | 93 | 88 | +17 |
| Buffalo | [illegible] | 80 | 70 | 98 | 96 | +14 |
| Cincinnati | [illegible] | [illegible] | [illegible] | 96 | 95 | +12 |
| Cleveland | [illegible] | [illegible] | [illegible] | 90 | 91 | +11 |
| Columbus | [illegible] | [illegible] | [illegible] | 98 | 97 | +6 |
| Detroit | [illegible] | [illegible] | [illegible] | 96 | 93 | +34 |
| District of Columbia | [illegible] | 44 | 26 | 77 | 70 | +1 |
| [illegible] | [illegible] | [illegible] | [illegible] | 83 | [illegible] | +1 |
| Indianapolis | [illegible] | [illegible] | [illegible] | [illegible] | 98 | +1 |
| Kansas City | [illegible] | 80 | 68 | 98 | 96 | +10 |
| Milwaukee | [illegible] | [illegible] | [illegible] | 100 | 98 | +17 |
| Nassau-Suffolk | [illegible] | (no central city) | | | | |
| Newark | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +29 |
| New Orleans | [illegible] | [illegible] | 40 | [illegible] | [illegible] | +18 |
| Philadelphia | [illegible] | [illegible] | [illegible] | 94 | [illegible] | +11 |
| Pittsburgh | [illegible] | [illegible] | [illegible] | 96 | 97 | +8 |
| St. Louis | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +12 |
| Group median | [illegible] | [illegible] | [illegible] | 96 | 93 | +14 |
| Hispanic group | | | | | | |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +17 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +21 |
| Los Angeles | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | −6 |
| Miami | [illegible] | [illegible] | [illegible] | 84 | [illegible] | +25 |
| [illegible] | [illegible] | 80 | [illegible] | 83 | 84 | +11 |
| Riverside | [illegible] | [illegible] | [illegible] | 89 | [illegible] | +12 |
| San Antonio | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +28 |
| San Diego | [illegible] | [illegible] | [illegible] | 94 | [illegible] | +1 |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +11 |
| Group median | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +12 |
| Black-Hispanic group | | | | | | |
| [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +18 |
| Chicago | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +24 |
| Dallas | [illegible] | [illegible] | [illegible] | 94 | [illegible] | +16 |
| Houston | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +13 |
| New York | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +29 |
| [illegible] | [illegible] | [illegible] | [illegible] | 96 | 92 | +22 |
| Group median | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | +20 |

[illegible]

## NAS Report

*Continued from page 3*

unlikely that slower population growth will allow a larger number of people to enjoy a given standard of living thanks to lower natural resource prices, slower population growth in essence "buys time" to prepare for a particular state of resource depletion.

- Slower population growth is likely to lead to a reduced rate of degradation of renewable common-property resources such as air, water, and species of plants and animals. In the long run, however, population growth might encourage proper use of such resources by making them scarce, driving up their value, and creating greater incentives to develop the social and political institutions necessary for conservation—provided, of course, that the resource has not become depleted beyond the point of restoration.

- Lower fertility is likely to increase average per child levels of household expenditure on health and education, and thereby improve levels of child health and education—depending on the distribution among income classes of the fertility decline. In addition, slower population growth is likely to raise public expenditures on schooling per school-aged child, and such a result may lead to some improvement in educational quality, as measured, for example, by test scores.

- Unless the fertility decline is concentrated among high-income families, slower population growth is likely to lead to a reduction in income disparities among social classes.

- When national fertility levels fall, cities will grow more slowly, both in the short and long run, through reduced natural increase. The evidence on whether reduced national fertility levels reduce the rate of rural-urban migration, and hence reduce the rate of growth of the *proportion* urban, is unclear.

- Important as environmental and climatic conditions may be to conditioning the economic response to population growth, they appear to be far less important than conditions created by people. Many of the initial effects of population growth are negative, but these effects can be ameliorated or even reversed in the long run if institutional adjustment mechanisms are in place.

### Conclusion

The report concludes that slower population growth generally helps economic development in most LDCs, and advocates government family planning programs as the best policy to achieve these lower rates. It points out that careful scientific research is needed both to better quantify and to further elucidate most of the relationships discussed therein.

The report deems voluntary family planning programs "the most conventional and direct instrument of government population policy," writing that, "In sum, there is little debate about the desirability of programs that allow couples access to easy, affordable, and effective means of family planning even among those who see population growth as neutral or even a positive influence on development."

Recognizing that when a couple's childbearing decision imposes external costs on other families, the report agrees a case may be made for policies that go "beyond family planning." It lists incentives and disincentives toward smaller families as the least undesirable method of government intervention but asserts that "there is no current evidence to suggest that population externalities are severe enough to warrant the imposition of drastic financial or legal restrictions on childbearing." —TA

# Demo-Sources—First of a Series

*Surely 90 percent of knowing something in the population field is knowing where to find it, which can be a difficult proposition in a world of 216 countries (depending on how you count them) with different senses of urgency about gathering and publishing data.*

*Nonetheless, standard demographic and population-related reference sources do exist, such as subject encyclopedias and handbooks, bibliographies and indexes, demographic and statistical yearbooks, and census publications. Any of these can be a lifesaver when a particular fact (e.g., the number of 5-year-olds in Thailand) is needed pronto.*

*What are they? Where are they available? With this article PT inaugurates a series on standard demographic and population reference sources, prepared by PRB's Librarian Denise Molaro.*

**International Encyclopedia of Population;** editor in chief, John A. Ross (Center for Population and Family Health, International Institute for the Study of Human Reproduction, Faculty of Medicine, Columbia University) (2 vols.) New York: The Free Press, 1982. 750 pages, illus. $145.00.

Along with a trend toward ever more specialized publications has come a boom in specialized subject encyclopedias. The *International Encyclopedia of Population* (IEP) is so far the only comprehensive subject encyclopedia in population. Directed toward a broad, international audience, the IEP's 129 medium-length signed articles—many written by well-known specialists in the field—avoid excessive technicality. Its level of difficulty is geared to population professionals reading outside their own specialties. The articles are organized around 11 broad topics: the field of population, data sources, population dynamics, fertility (determinants and regulation), marriage and divorce, morbidity and mortality, population distribution, population and natural resources, population laws and policies, regions and countries, and population organizations and agencies. Because the book concentrates on present-day knowledge, the historical aspects of demography and biographies are excluded (although the basic history of major study areas is included).

The articles themselves range widely, from, say, one on breastfeeding by John Knodel to a masterly exposition by Gavin Jones of theories on fertility determinants. Geographic coverage is provided through separate articles on the 11 most populous countries (in order) China, India, the Soviet Union, the United States, Indonesia, Brazil, Japan, Bangladesh, Pakistan, Nigeria, and Mexico, plus Canada. All other countries are covered in regional entries, e.g., Latin America, sub-Saharan Africa, North Africa and Southwest Asia, etc.

Though the IEP has some minor flaws, the most urgent concern is that no revision is planned by the publisher of this benchmark work. The editors anticipated this and concentrated on demographic trends and projections, rather than on current data. By doing so, the value of the *IEP* as a reference source for classic articles at the outset of the 1980s period is assured; however, without a revision the long-range *ready* reference value one expects from a subject encyclopedia is limited.

# Defending Nations Requires More Than Arms

If countries are to deal with deteriorating ecologies and mounting debts, they can no longer continue to boost expenditures on armaments, according to *State of the World 1986*, third in a series of assessments published by the Worldwatch Institute, a Washington-based research group.

The steady expansion of the world economy for most of a generation has heretofore permitted both more guns and more butter, but for many countries this age has come to an end. Environmental decline and economic deficits may now be a greater threat to national security than armed aggression, the report states.

Along with military expansion, other topics explored in the report include innovations in water conservation, new trends in electricity generation, the financial challenge of decommissioning nuclear power plants (which can be as expensive as constructing them), and the health costs of worldwide tobacco smoking. In order to present a broad view, the authors highlight positive initiatives a few countries have undertaken in every area to provide models for the rest of the world.

The Worldwatch study found that global military expenditures grew steadily over the last quarter-century, outpacing the growth of the world economy. "Global military outlays in 1985 exceeded the income of the poorest half of humanity," observed Lester R. Brown, president of the Worldwatch Institute and director of the study. "For many Third World countries the choice is either continued militarization or the restoration of the economy's environmental support systems."

The study applauds countries such as China, Argentina, and Peru for cutting military outlays. According to the report, China and Argentina have reduced by half the share of GNP used for military purposes over the last several years. —CA

Copies of *State of the World 1986* by Lester R. Brown, William U. Chandler, Christopher Flavin, Cynthia Pollack, Sandra Postel, Linda Starke, and Edward C. Wolf, are available from PRB at a special price of $6.00 for PRB members. The cost to nonmembers is $8.95. Orders and checks (made payable to PRB) should be sent to PRB Circulation Dept., P.O. Box 35012, Washington, DC 20013.

# Sun May Be Setting on IUD

Intrauterine devices (IUDs) may soon become a scarce form of birth control in the U.S. In February, the last major IUD manufacturer, G.D. Searle, announced that the company was stopping U.S. sales of the device because of "unwarranted" lawsuits and the practical impossibility of obtaining affordable liability insurance. Searle is the manufacturer of the Copper-7 and TATUM-T IUDs.

There is no reason for women already using an IUD to stop using it, said the company. This view was echoed by medical specialists and Planned Parenthood. Searle emphasized that their decision was an economic, not a health-related issue, and that they considered their devices safe.

Searle's move essentially leaves the U.S. public without a supplier of IUDs. Another major manufacturer, Johnson & Johnson, stopped marketing the Lippes Loop in September 1985. The only domestic marketer of IUDs is now the small California firm of Alza, which makes a hormone-releasing type of IUD.

With 2.15 million U.S. users, the IUD is considered to be the country's third most popular form of birth control, after sterilization and the pill. Critics charged that it is associated with pelvic inflammatory disease (PID) and infertility. And the exceptional defects of one model of IUD, the Dalkon Shield, were such as to cause its manufacturer, A.H. Robins, to go into bankruptcy in 1985.

The basic IUD, however, is a simple form of birth control with no chemical side effects and a high degree of effectiveness (though not as high as the pill's). If it ceases to be a widespread form of contraception, U.S. women will likely have to choose from the other standbys, as a new generation of ultra-effective and convenient contraceptives (implants, vaccines, male pills) is still years from reaching the marketplace. —*A.H.*

## POPULATION UPDATE

### Estimated United States Population

| | |
|---|---|
| As of October 1, 1985 | 239,929,000 |
| As of October 1, 1984 | 237,669,000 |

See page 4 for an advance, unpublished estimate. The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 979.

### Estimated World Population

| | |
|---|---|
| As of March 1986 | 4,901,000,000 |
| Annual Growth | 82,000,000 |

Estimated by extrapolation of the mid-1985 world population given on PRB's 1985 World Population Data Sheet.

### Latest Provisional Statistics for the U.S.: October 1985

| | 12 months ending with October | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,754,000 | 3,669,000 | 15.8 | 15.6 | 15.7 | 15.9 |
| Deaths | 2,088,000 | 2,033,000 | 8.8 | 8.6 | 8.6 | 8.6 |
| Natural increase | 1,666,000 | 1,636,000 | 7.0 | 7.0 | 7.1 | 7.3 |
| Marriages | 2,432,000 | 2,469,000 | 10.2 | 10.5 | 10.5 | 10.8 |
| Divorces | 1,187,000 | 1,160,000 | 5.0 | 4.9 | 5.1 | 5.1 |
| Infant deaths | 39,300 | 38,900 | 10.4 | 10.6 | 11.1 | 11.4 |
| Population base (in millions) | | | 237.9 | 235.8 | 233.4 | 231.1 |

Note: Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

Source: *Monthly Vital Statistics Report* (Vol. 34, No. 10) from the National Center for Health Statistics.

## Dutch Census

*Continued from page 5*

1980-1981 Census, two noncompulsory pilot tests yielded such high nonresponse rates that upon the advice of the statistical authorities the responsible Minister proposed to Parliament on June 2, 1980 "that the impending census be postponed." This proposal was accepted and it was decided "not to hold a census before 1983."

This decision was considered an indefinite postponement by many, and in fact no census has been held. The law still stipulates that a census should be held in 1990 or 1991. However, the Central Statistical Commission has already advised the Minister not to submit the necessary proposal to Parliament.

Based on the above decisions and many people's readings of the national mood, census taking may not now be a viable form of data collection in the Netherlands. Whether the Census Law will be officially repealed is unclear; it is quite possible that for the next half century or so a solemn decision not to conduct a census will be made at regular 10-year intervals.

The consequences of not taking a regular census are many, though for a country such as the Netherlands they should not be exaggerated. The Netherlands has a universal population register that records births, deaths, and changes of residence as they occur. Yearly register counts, soon to be done automatically, generate population figures for even the smallest areas, and special surveys on labor force participation, housing requirements, and so on yield data roughly comparable to those obtained through a census.

Nevertheless, a population and housing census is an unrivaled source of multivariate data. And at present the country is left on the one hand with the problems of providing many varied societal services while being unable to gather the kind of data that would help the distribution of such services.

Dirk J. van de Kaa, Director
Netherlands Interuniversity
Demographic Institute

A.H.

## Correction

In "Conflict in Central America: The Demographic Dimension," the PRB *Population Trends and Public Policy* paper for February 1986, the numbers along the y-axis of Figure 1 should have been labeled "Population in thousands."

# TAKE A NUMBER

**Capital Improvement:** The population of Washington, DC, has ceased declining, according to U.S. Census Bureau estimates. This reflects a trend in other large U.S. cities which have seen previous population losses taper off in the 1980s. Thus it would seem that what one local bank trumpets as "the most important city in the world" in their TV ads (as in "the most important bank in the ...") is in no immediate danger of disappearing.

**Kinder Preferences:** Concern over low birth rates is becoming more evident in the low fertility countries of Europe, with West Germany's total fertility rate of 1.3 children per woman the world's lowest. As we have noted in this space, one does wonder just how low a country's birth rate can go (the nation that does the limbo goes into limbo?) and whether the low fertility is a result of actual desired family size or some other factor.

Survey data from West Germany through 1980 give some surprising insights into attitudes in the country. In 1980, 60 percent of Germans indicated that 2 children constituted the "ideal" family size, according to Elisabeth Noelle-Neumann of the Institut für Demoskopie. The proportion feeling that one child is about right has not changed much since the 1950s, holding steady at about 11 percent. Overall, the average rose from about 2.2 children in 1950 to 2.4 in 1964 and appears to have held steady in recent years at 2.1—a figure which just happens to correspond exactly with "replacement level" (the average number of children per woman needed to ensure eventual stabilization of population size). These data are reproduced graphically in *The Germans: Public Opinion Polls, 1967-1980*, a 1981 book by the above author.

**New World Bank Projections Released:** The World Bank has released its most recent series of long-range projections for the world's countries and they suggest a world population size of 10.7 billion when population growth stabilizes sometime in the 22nd century. A more complete review of these projections will follow in a future issue of *PT*, but here are a few highlights. Africa is projected to rise to 2.6 billion, assuming that fertility on that continent decreases to the 2-children-per-woman level by 2040. India at 1.7 billion would outstrip China's 1.6 billion, assuming a two-child average for India by 2010. The Bank's numbers, prepared by My T. Vu, are the only widely available set of projections that take individual countries' populations into the 22nd century; they also feature each country's age structure and selected vital rates. C.H.

# ADDENDA

## Signs of the Inexorable Aging of America–III

Sitting in front of their sets, U.S. TV watchers are not getting any younger. Responding to this national age shift, the networks now offer even older heroes and heroines (and plots), e.g., Edward Woodward flashing old fogy youth on *The Equalizer*; Hal Linden and Harry Morgan solving crimes on *Blacke's Magic* (a show whose younger member is in his fifties), and *The Golden Girls*, shown at left, generally cutting up (clockwise from top: Rue McClanahan, Betty White, Estelle Getty, and Bea Arthur).

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

## WORLD MILITARY AND SOCIAL EXPENDITURES 1985

by Ruth Leger Sivard (10th ed.) Washington, DC: World Priorities, 1985. 52 pages. $5.00. ISBN 0-918281-01-6.

Sivard's reference work, now in its 10th edition, compares military expenditures to social expenditures in 142 countries. The array of data includes figures on GNP, education, health, human rights, nutrition, and water.

This compendium provides ammunition on the awesome military buildup since World War II with diverse charts, graphs and maps. Sivard points out how exaggerated military strengths have nourished fears and driven up expenditures. In the arms race research is the instrument that ensures the neverending escalation of arming; twice as much public money is spent for military research as for all civilian needs combined.

This five-dollar bargain about the world's annual $800 billion weapons bounty, though not encouraging, is a useful defense weapon in its own right for the social scientist as well as for every citizen.

—*Alexander von Cube*

## ABORTION: Medical Progress and Social Implications, Ciba Foundation Symposium 115,

edited by Ruth Porter and Maeve O'Connor. London: Pitman Publishing, 1985 (distributed in the U.S. by the Medical Education Division, CIBA Pharmaceutical Co., Box 18060, Newark, NJ 07101). 285 pages. $35.00. ISBN 0-272-79815-0.

In November 1984 a diverse group of international experts met in London to present information about abortion in many countries and discuss the implications of recent medical, scientific, and sociological research findings.

One result of the conference was this volume. The fascinating array of topics include coverage of abortion practices in specific areas (England and Wales, Slovenia, the U.S., Japan, Thailand and Sweden, Kenya) along with medical and psychological aspects of abortion (the effects of abortion on a marriage, postabortion and postpartum psychiatric hospitalization).

Ethical aspects of abortion are covered, including "Viability and the Moral Status of the Fetus," "Politics and Abortion," and "Legal Abortion: Limits and Contributions to Human Life." One most provocative chapter describes a followup study of 220 children born to Czech women who were twice denied abortions. The study found that these "unwanted" children displayed pronounced negative characteristics relative to the control group of "wanted" children.

For a wide variety of interesting discussion on abortion, readers need look no further than this book. While coverage is not all encompassing, virtually anyone can find some nugget of wisdom within.

—*Janine Adams*

## SOUTH AMERICA, CENTRAL AMERICA, AND THE CARIBBEAN 1986.

London: Europa Publications Ltd. (distributed by the Gale Research Co., Detroit, Mich.). 582 pages. 1985. $90.00. ISBN 0-946653-11-9.

This helpful reference will aid anyone in need of a quick overview of any Latin American or Caribbean nation. It starts with sweeping essays on the region's historic, economic, and political situations, and then moves to detailed country surveys with overviews of the economy, history, and resources of each nation and a detailed directory including names of national political, trade and industry, and media figures and institutions.

While specialists on individual countries may find that this directory only scratches the surface, most readers will find it an invaluable source of quick and convenient data fixes. Some numbers are outdated, but that's to be expected in any reference work that contains such detail. One final bonus is a handy alphabetical guide to the main organizations in or involved with Latin America and the Caribbean.

—*Carol Bradford*

## Books Received

**CHINA: Urban Statistics 1985,** compiled by State Statistical Bureau, People's Republic of China (dist. in the U.S. by Gale Research, Detroit, Mich.). 1985. 703 pages. $120.00.

**COUNTRIES OF THE WORLD AND THEIR LEADERS YEARBOOK 1986,** edited by Frank E. Bair. Two volumes. Detroit, Mich.: Gale Research, 1985. 1592 pages. $110.00 per set.

**THE EXTREME AGED IN AMERICA: A Portrait of an Expanding Population,** by Ira Rosenwaike. Westport, Conn.: Greenwood Press, 1985. 253 pages. $35.00.

**THE FERTILITY REVOLUTION: A Supply-Demand Analysis,** by Richard A. Easterlin. Chicago: Univ. of Chicago Press, 1985. 209 pages. $24.95.

**HOUSEHOLDS, EMPLOYMENT, AND GENDER: A Social, Economic and Demographic View,** by Paula England and George Farkas. New York: Aldine, 1985. 237 pages. $29.95.

**LABOR MIGRATION IN THE ATLANTIC ECONOMIES: The European and North American Working Classes During the Period of Industrialization,** edited by Dirk Hoerder. Westport, Conn.: Greenwood Press, 1985. 491 pages. $55.00.

**LATER LIFE TRANSITIONS: Older Males in Rural America,** by Edward A. Powers et al. Boston: Kluwer-Nijhoff, 1985. $34.00.

**THE MIDDLE EAST AND NORTH AFRICA 1986.** London: Europa Publications Ltd. (Distr. by Gale Research Co., Detroit, Mich.). 1985. 863 pages. $125.00.

**POPULATION AND DEVELOPMENT PROJECTS IN AFRICA,** edited by John I. Clarke et al. Cambridge, Mass.: Cambridge University Press, 1985. 329 pages. $49.50.

**THE STATE OF BLACK AMERICA 1986,** edited by James D. Williams. New York: National Urban League, 1986. 220 pages. $18.00.

**WHY PEOPLE INTEND TO MOVE: Individual and Community-Level Factors of Out-Migration in the Philippines,** by Sun-Hee Lee. Boulder, Colo.: Westview Press, 1986. 155 pages. $21.00.

# SPOTLIGHT

## BOLIVIA

Population (1984 est.): 6.2 million
Land area: 424,160 sq. miles
Births per 1,000 pop.(1983): 42
Deaths per 1,000 pop.(1983): 16
Rate of natural increase (1983): 2.1 percent
Total Fertility rate: 6.3
Infant mortality rate: 124 infant deaths per 1,000 live births
Life expectancy at birth: 51 years
Major exports (1982): tin, petroleum, lead, zinc, silver
Major imports (1982): foodstuffs, chemicals, captial goods
Capital (de facto): La Paz

by Paola Scommegna

Bolivia is a landlocked country in the heart of Latin America. Eighty percent of its population is clustered in the southwestern half of the country, which is divided into two ecological regions — the Altiplano or high plateau, and the Valles, the northeastern arm of the Andean mountain range that surrounds the Altiplano. These two areas contain the country's principal cities, its industrial centers, agricultural heartland, and the mineral deposits that have been the base of its economy.

Bolivia's sparsely populated northeastern half, referred to as the Llanos or lowlands, is covered with dense rain forest interspersed with open savannas that join the Amazon basin. This region contains Bolivia's petroleum, natural gas, and iron ore deposits. For the past two decades, government policy has encouraged migration to this region in the hope that industry and cultivation will spur economic development. The Indian population, however, has been reluctant to move.

Sixty percent of Bolivia's 6.2 million people are Indians. Europeans make up between 10 and 15 percent of the population and are primarily of Spanish origin, reflecting Bolivia's colonial past. People of mixed Indian-Spanish heritage comprise the remaining 25-30 percent of the population.

Until the mid-1980s, all government-sponsored education (including literacy programs) was conducted in Castilian Spanish. Thirty-six percent of the population speak only Spanish, 22 percent speak either Quechua or Aymara (the languages of the two major Indian groups), 40 percent are bi- or trilingual, and 2 percent speak other languages.

Bolivia is one of the very poorest countries in Latin America. In fact, as of 1982, Bolivia's GNP per capita of US $530 was less than one-third the Latin American average, and ranked second-lowest (to Haiti) in the Western Hemisphere. Because of such poverty, emigration is a serious problem. Nearly 15 percent of the nation's high school and university graduates leave Bolivia in search of work.

This poverty is reflected in the living conditions of the population. A 1977 UN Food and Agriculture Organization study estimated that 45 percent of the population did not consume the minimum number of calories to maintain health. Only one-third of the population has access to potable water. Only one-third has access to any type of health care, and only two-thirds of the population is literate.

Like most developing countries, Bolivia has a very youthful population: 44 percent of the total population is under 15, while only 3 percent is over age 65. The dependency ratio — the number of children that each 100 adults must support — is 88; in the U.S. and most industrialized countries that figure is more like 35. The population growth rate is 2.7 percent, ensuring continued growth in the school-aged population. Because of the undeveloped land and mineral resources in the Llanos, population growth has been encouraged by the government. After the 1976 Bolivian Census counted 1 million fewer people than estimated, the government-sponsored contraceptive promotion program was canceled in favor of greater emphasis on maternal and child health. Contraceptive usage is negligible.

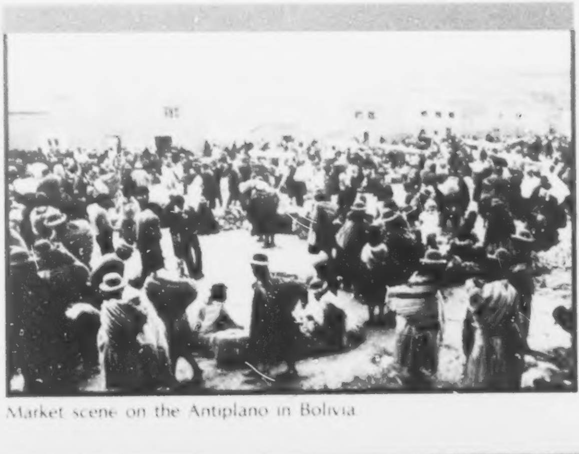
Urban areas grew almost twice as fast as rural areas during the 1970s, a result of rural-to-urban migration. La Paz, the actual capital city (Sucre is the legal capital), is home to 25 percent of the country's total population.

Demographically, Bolivia is more similar to many sub-Saharan African countries than to its Latin American neighbors. The total fertility rate (TFR) is 6.3 average lifetime births per woman. Among the Aymaran population (who constitute 25 percent of the country's total population), the TFR is 8.5. Despite the youthfulness of the population, Bolivia's death rate is 16 per 1,000, twice as high as the Latin American regional average. Life expectancy at birth in 1985 was 51 years, more than 12 years lower than the regional average.

The high death rates and low life expectancy estimates reflect Bolivia's high infant and child mortality rates. UN estimates place infant mortality at 124 per 1,000 live births. However, recent UNICEF estimates made in Bolivia place infant mortality at a much higher 167 infant deaths per 1,000 live births.

These high infant mortality rates are both evidence of and the result of the effects of the worst economic crisis to hit Bolivia in its history. Brought on by a combination of drought and flooding, debt, the remnants of corrupt military rule, and a stagnated tin and natural gas market, this crisis resulted in a drop of 15 percent in the country's GNP between 1980 and 1983.

Paola Scommegna, a former PRB policy analyst, is a Washington freelance writer.



Market scene on the Antiplano in Bolivia

12150-1

# POPULATION TODAY

Vol. 14, No. 4 April 1986

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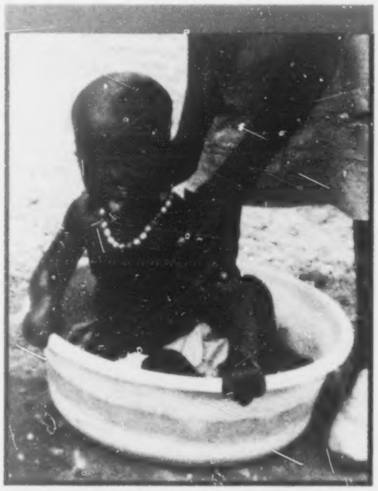

Botswana's strong family planning and child health services. See page 4

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# FROM THE EDITOR'S DESK

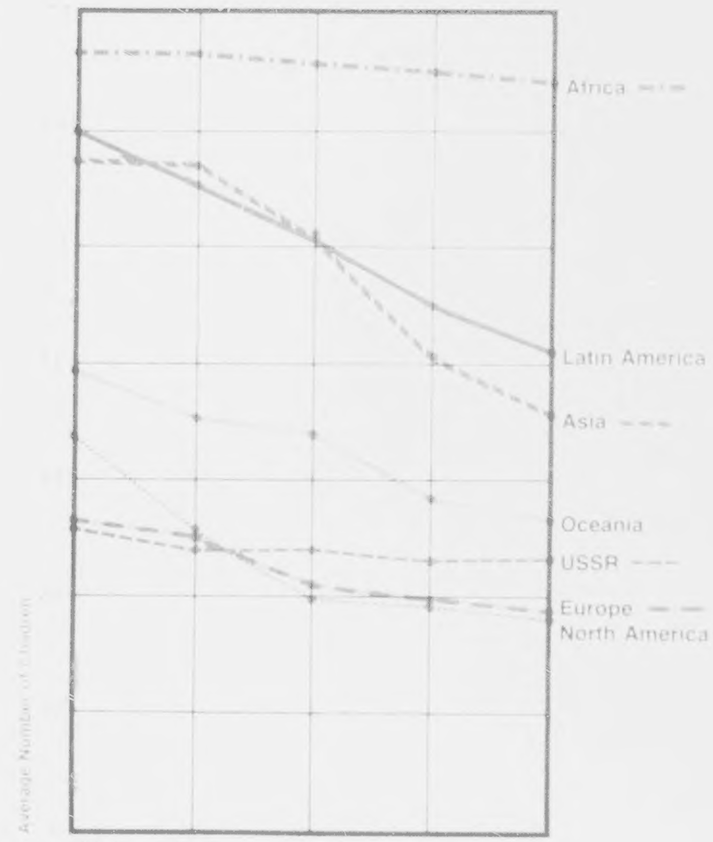
Remember your first geography lesson? Remember how some cities appeared not just as dots, but were instead indicated by stars?

From Abidjan to Yaounde, having a capital is a glamorous, nearly mandatory part of countryhood; in fact some countries (Bolivia, the Netherlands, the Philippines, South Africa) have more than one, just to be on the safe side.

Now PRB's latest *World Population Data Sheet* (see story next page) includes a comprehensive list of capitals. Perusing them is educational – though some capitals are toughies (Fagatogo? Antananarivo?), a number of them unimaginatively take their names from their country (e.g., Algiers, Brasilia, Djibouti, San Salvador, Guatemala, Sao Tome, etc.). And for *Trivial Pursuit* buffs for whom U.S. capitals are duck soup (Louisville, Minneapolis, Wilmington . . . but you know them already), thanks to the *Data Sheet*, you can now take on the world.

— *Art Haupt*

# SPEAKING GRAPHICALLY



The above graph sums up the recent fertility of the world's regions, charting their total fertility rates (TFR), i.e., total average lifetime children per woman. As is readily apparent, Asia's TFR dropped most sharply, in part due to China's family planning program, but all regions have experienced some decline.

Source: UN 1984 assessments and projections.

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# Population Momentum is the Key

Earlier this year, estimated global population passed the 4.9 billion mark. This figure is nearly twice the 2.5 billion population of the world in 1950, when wide dissemination of health measures was touching off the postwar "population explosion" in the less developed countries (LDCs). And the beat goes on.

The extent of this sizable 1986 population, and where its growth is taking us, are examined in different ways by two just-released PRB publications.

- "World Population in Transition," the April 1986 *Population Bulletin*, offers an in-depth status report on this growth, its trends, and the debate over its effects, written by PRB's President Thomas W. Merrick, with PRB staff.
- The *1986 World Population Data Sheet* is PRB's 24th annual compendium of country-by-country statistics. Nearly 3,000 figures are given on everything from projected populations to infant mortality to per capita GNPs for 171 countries. This is an enhanced and expanded edition of PRB's popular data sheet, prepared by Mary M. Kent and Carl Haub.

## Where We Are

Global population has been growing at 1.7 percent annually in recent years, down from its peak of 2 percent a year in the late 1960s. For 1986, this works out to some 83 million people – or 158 per minute.

Close to 92 percent of this growth is concentrated in the less developed countries of Africa, Asia (minus Japan) and Latin America. As the Data Sheet shows, virtually all more developed countries (MDCs) are below replacement level fertility – i.e., below the 2.1-child-per-woman average necessary for couples to "replace" themselves in the population. (Some are far below, like West Germany, Denmark, and Hungary, countries that are already experiencing natural decrease, a fate that awaits other more developed countries if fertility does not soon rise to replacement level.)

In less developed regions as well, however, fertility rates and growth rates are declining, except in sub-Saharan Africa and parts of Latin America and South Asia. The UN projects that by 2025, most LDC countries will be at replacement level or close to it.

> The sharper the drop from high to low fertility, the greater role momentum plays.

## Mighty Mo

Despite declining growth rates for most of these countries, actual numbers added annually will continue to climb for some decades, because of one of the least understood – or at any rate, least publicized – population dynamics: *demographic momentum* (see box on page 8).

Momentum is the phenomenon that ensures increasing births for a generation or two even after a population's average fertility drops to replacement level. It may seem paradoxical that a country can grow when couples are just (or not even) replacing themselves. (This is the case, for example, in the U.S., to which 1.7 million people are added annually through natural increase even though fertility has hovered at 1.8 births per woman – well below replacement – since the mid-1970s.) But momentum occurs because the numbers of new mothers grow as an echo effect of past high fertility, and a population stops growing only after this echo effect has worked its way through the population's age structure. The higher fertility is to begin with, and the sharper the drop to low fertility, the greater role momentum plays.

In most developing countries, the

Continued on page 8

## 1986 World Population Data Sheet

### Highlights

World population as of mid-1986: 4.924 billion

More developed country (MDC) population: 24 percent of world total

Less developed country (LDC) population: 76 percent of world total

China's population: 21.2 percent of world total

World birth rate: 27 births per 1,000 population

World death rate: 11 deaths per 1,000 population

World rate of natural increase: 1.7 percent (rounded)

World total fertility rate: 3.6 lifetime children per woman

MDC total fertility rate: 1.9 lifetime children per woman

LDC total fertility rate: 4.2 lifetime children per woman

World infant mortality rate: 82 infant deaths per 1,000 live births

World life expectancy at birth: 62 years

Highest natural increase: Kenya, 4.2 percent

Highest natural decrease: West Germany, Hungary, both 0.2 percent

Highest percentage of population under 15: Kenya, 53 percent

Highest percentage of population 65 and over: Denmark, Norway, West Germany, all 15 percent

Highest percent urban: Singapore, 100 percent

Lowest percent urban: Bhutan, Rwanda, 5 percent

# Grass Roots Family Planning in Africa

*Jean van der Tak, PRB's Senior Editor and Editor of the Population Bulletin, recently returned from an informal survey of family planning in Zimbabwe and Botswana. Her report:*

Zimbabwe's 1984 Reproductive Health Survey found a national average of 27 percent of married women using modern contraceptives, the highest rate recorded so far in continental sub-Saharan Africa (see *PT*, January 1986). For that, much of the credit goes to community-based distributors like Grace Tavinenvika, one of some 400 women in the "backbone" program of the Zimbabwe National Family Planning Council.

With her supervisor Joyce Hore, we followed Grace on her rounds on an overcast summer's morning in February, threading through the ripening corn to clusters of round, concrete-and-brick, thatched-roof huts, 20 miles east of Harare, Zimbabwe's capital. Grace, who trained six weeks for her job and is paid 160 Zimbabwean dollars (about US $100) a month, covers each point on her map every three to four weeks, usually on her bicycle (in for repairs that day). Her first "repeat client" of the morning had forgotten a pill and was pregnant; the second had announced the last time that she was stopping to get pregnant. Grace checked records with the next several smiling women and left new pill supplies. ("About 80 percent choose the pill," she said; those choosing IUDs are sent to the nearby health post for insertions.)

Dorothy (age 20), clutching son Tapwa ("nearly three") and year-old daughter Simba, was hesitant. Husband Toga (26) wasn't sure about the pill. Luckily, Toga was nearby. ("We like to get husbands in at the beginning," Joyce explained, "but around here most of them work in Harare during the week.") Seated facing Toga with Dorothy beside her, Grace went through her display card of pills, the Lippes loop IUD, condom, and diaphragm, extolling the health and economic benefits of family planning (in Shona, with Joyce interpreting to the visitors).

Jean van der Tak

Family planning recruits Dorothy and Toga with community-based distributor Grace Tavinenvika and supervisor Joyce Hore in Zimbabwe (left to right).

Toga was convinced after about 15 minutes and Grace then questioned Dorothy on a list of conditions that might "contraindicate" pill use. Did she have prolonged headaches, shortness of breath, sore knees, missed periods when not pregnant, etc.? Dorothy said she did have sore knees sometimes, so Grace, after checking her blood pressure, gave her a month's supply of progestin-only "minipills" (40 cents; further pills — supplied by USAID — would be free, since Toga's monthly earnings were under 120 Zimbabwean dollars) and a two-week supply of condoms for Toga, to tide them over. If Dorothy passed a later full physical at the health post, Grace would be back every three to four weeks to check her progress and keep up her supply of combined estrogen-progestin pills.

"We advise women to plan for three years between births," Grace said. How many children did Dorothy and Toga want? The answers — six from Dorothy, two from Toga — foretold some compromising to be done in that family. "Most women say, 'I haven't thought about it,' or 'It's up to my husband,'" said Grace, "but if I press them they say four" (two fewer than the 1984 survey's "expected" average).

Back in Harare at Joyce and Grace's Mashonaland provincial headquarters, manager Monica Sibindi showed off the detailed records compiled by her 20 supervisors on the 10 to 12 distributors each was responsible for: monthly numbers of repeat visits (usually upwards of 200), new recruits (at least 10), pill cycles and condoms received and given out.

The next day at the University of Zimbabwe on Harare's northern edge, University of Pennsylvania-trained demographer Dr. Marvellous Mhloyi was skeptical of the 1984 national survey's vaunted 27-percent modern contraceptive prevalence rate. From her own early 1985 "qualitative" survey of 120 women and men in two "maybe untypical" rural areas, she figured it at more like 10 percent, "though probably 100 percent of couples have used traditional methods — mainly withdrawal — at some time."

She added hastily: "Don't get me wrong. I'm positive our total fertility

Jean van der Tak

Mother and child in Francistown, Botswana.

Continued on page 10

# Record Number of Illegals Entering U.S.

Mexican illegal aliens are crossing the border into the U.S. in record numbers, according to the U.S. Immigration and Naturalization Service (INS). The migration flow has doubled at some southern entry points in recent months.

In January 1986 the Service apprehended 131,500 illegals on the Mexican border, a 53-percent jump over the same month in 1985. With 1.2 million border apprehensions, 1985 was a record year. The INS projects that 1986 will see 1.8 million apprehensions.

Increases in the Border Patrol along the southern border – to 2,629 agents – is given as one reason for the increase. But the principal cause is believed to be the difficult Mexican economic situation in recent months exacerbated by the Mexico City earthquake and by the plunge in world oil prices. The latter has drastically reduced the income from oil fields and threatens Mexico's ability to pay its international debt.

The U.S.-Mexican border is a world anomaly – a unique instance of a prosperous more developed country bordering directly on a populous less developed one. Needless to say, apprehensions account for only part of the presumed migration northward – an informal, unprovable rule of thumb posits that for every alien apprehended, one (or two, or three) passes through undetected. The U.S. Census Bureau recently changed its population estimation process to include the hypothetical component of 200,000 illegal migrants entering the U.S. each year (see "Take A Number," page 10).

Meanwhile, immigration reform remains an unsettled issue in Congress. The bill sponsored by Sen. Alan Simpson (R-Wyo.) was passed by the Senate last September, but the latest House version, co-sponsored by Reps. Peter Rodino (D-N.J.) and Romano L. Mazzoli (D-Ky.), is now pending before the full House Judiciary Committee, with no date yet set for action. AH

# SURVEY REPORT

## Urban Somalia

In Somalia, where population growth is considered satisfactory by the government, and family planning services (as well as good data) are limited, new surveys on family planning attitudes and practices provide valuable insights.

The Somali Family Planning Survey was conducted between June and November 1983 by the Family Health Unit of the Ministry of Health in conjunction with the Contraceptive Prevalence Survey project at Westinghouse Health Systems, with funding from USAID. Five Somali cities, Mogadishu, Hargeisa, Kismayo, Bayhaba, and Burco, were selected for the survey since they had been the focus of a previously launched family health/family planning project. A total of 3,016 ever-married women were interviewed.

The survey reveals an ardent desire for children on the part of the women, with correspondingly limited knowledge on contraceptive methods. The data indicate that by the time they reach their early 40s, Somali women have given birth to between 6 and 7.5 children on average.

The data on children ever born to these women show that between 25 and 30 percent of the ever-married women give birth to a total of 8 or more children. Three-quarters of the women in Kismayo, Baydhaba, and Mogadishu give birth to at least 5 children. At the other end of the spectrum, a substantial proportion of women in Burco (13 percent), Baydhaba (10 percent) and Hargeisa (8 percent) remain childless at the end of their reproductive lives.

About 95 percent of the currently married respondents said they want to have more children. These high levels of desire for future childbearing among married urban women in Somalia suggests that women there do not think in terms of limiting the number of children they bear. Even among women 40-49 years old, only between 4 and 20 percent of married women say they want no more children, as do less than 25 percent of women with 8 or more surviving children.

Contraceptive knowledge is rather low in Somalia. When questioned, less than one in six women could name a method without prompting. In only one city, Baydhaba, do as many women know a method as do not. The percent of total knowledge (prompted and unprompted, modern and traditional methods) is in the low 40s in Mogadishu, Hargeisa, and Burco, but is only 20 percent in Kismayo. In general, just under half of the women who knew about at least one method approved of the use of family planning.

The levels of both ever-use and current-use of contraceptive methods are extremely low in urban Somalia. Only 3.6 percent of the women surveyed in Hargeisa have ever used a method, and 2.6 percent of the women there were using contraceptives at the time of the survey. In the other four cities, both ever-use and current-use are less than 1 percent. The pill is the only method with which women have some experience in all the cities.

The survey included a series of questions on the prevalent practice in Somalia of female circumcision. 100 percent of the women surveyed had undergone this operation. Most of them had undergone a pharaonic circumcision, the most severe of the three types, in which the labia minora and the whole of the clitoris are removed; in addition to this excision, infibulation is performed. The overwhelming majority of the women (82 percent in Hargeisa and over 90 percent in the other cities) approve of the procedure. Virtually all of the women believe in having their daughters circumcised. EA

# DEMOGRAPHER'S PAGE

## As China's One-Two Fertility Debate Turns

by H. Yuan Tien

After a lapse of nearly five years, the China Demographic Society convened its Fourth National Conference in November 1985. The meeting's twin themes were "Urban-Rural Economic Reform and Population Problems" and "Exploring Ways of Achieving Socialist Planned Reproduction with Chinese Characteristics."

In his keynote address, Mr. Wang Wei, Director of the State Population Planning Commission, concentrated mainly on the second principal concern, planned reproduction. Interestingly, nowhere in the address was there any reference to China's minimal fertility policy of "one child per couple," the centerpiece of the country's population programs and the focus of worldwide fascination since 1979. The salience of this omission looms particularly large in the context of what Mr. Wang did say about population planning.

"The task of planned reproduction touches tens of thousands of families and hundreds of millions of people," he declared. "It affects the course of our country's socialist four modernizations. Therefore, in planned reproduction activities, the bottom line must be social benefits. The Central Committee of the Party has pointed out that planned reproduction activities must effectively control population growth and also bring closer together the Party and the people as well as enhance stability and unity."

Mr. Wang added: "Plans for population control must serve to adjust the age structure of the population well. Not only should they not allow the young age structure of the population to continue too long, but they also should not permit an old age structure to emerge too quickly and too hastily. Not only must they take into account the needs at the end of the present century, but they also must meet the requirements of the 2050s. . . . Only then can they yield positive benefits."

### More than One Child

Despite great efforts, China's promotion of minimal reproduction has not resulted in exclusively one-child couples. Findings from a large-scale sample survey in Shanghai, Hebei, and Shanxi in April 1985, for instance, indirectly document a second child present in a significant number of households (see Table 1).

> "… A plan that requires all or the majority of the families to have only one child, is difficult for the great majority of the people to accept."

Participants at the Society meeting took three different approaches. One view deemed the current one-child goal worth striving for, even if not fully attained. Others favored "plugging big holes" (i.e., preventing second births outside population plans and all births of higher parities) but endorsed the existing practice of "opening small holes" (i.e., permitting exceptions according to local circumstances). In these two views acceptance of the second child either was ambiguous or amounted to passive accommodation with reality.

A third view favoring second children deserves special attention. It may well turn out to be the direction of possible modifications in China's population planning programs.

As reproduced in Table 2, the projections based on two children per couple bear a 1984 date, but had been prepared by Mr. Liang Zhontang for publication in an internally circulated journal in 1983. These figures apparently also served as the basis for discussion at the 1985 Conference. No attempt is made here to assess their accuracy; their poignancy lies much more in the thinking and justifications behind them.

### "Xi" and "Shao"

Of paramount interest is the fact that the making of projections of this kind began with, if not before, the start of the "one-child-per-couple" policy. At the Second National Conference on Population in December 1979, Mr. Liang articulated various reservations about the one-child limit. It would lead, he stated, to a too rapid process of population aging and too many people without children at their side in old age. It would create, in 40 years, an abnormal population pyramid, rendering it necessary for one young couple to have to support four parents and one child (the 4-2-1 population structure).

**Table 1: Distribution of All Births by Parity in Shanghai, Hebei, and Shanxi, 1980-April 1985**

| [illegible] | First | Second | Third or more |
|---|---|---|---|
| Shanghai | 80.6 | 13.4 | [illegible] |
| Hebei | 46.6 | [illegible] | 14.2 |
| Shanxi | 44.3 | [illegible] | 25.2 |

Source: State Statistical Bureau, People's Republic of China.

H. Yuan Tien is professor of sociology,
Ohio State University, and a past
Visiting Scholar at PRB.

## Table 2: Population projections based on two children per couple, People's Republic of China, 1984-2040

| Period | Marriages or 1st Births | 2nd Births | Total Births | Total Deaths | Net Gains | Popul. end pop. (in millions) |
|---|---|---|---|---|---|---|
| | | | (Annual figures in millions) | | | |
| 1984-1990 | [illegible] | | [illegible] | [illegible] | [illegible] | [illegible] |
| 1991-2000 | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] |
| 2001-2010 | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] |
| 2011-2020 | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] |
| 2021-2030 | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] |
| 2031-2040 | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] | [illegible] |

Source: Liang Zhongtang, [illegible]

Notes for the table: [illegible]

[illegible]

More important, he went on to say, "the current model calls for in rapid succession within the period of a few decades a reduction to one child from two children, a return from one child to two children, from two to three or more children, and finally restriction on high-parity births. These shifts make it impossible for the people to know what to follow in reproductive matters.

Lastly, given the level of our country's economic development, a plan that requires all or the majority of the families to have only one child also is difficult for the great majority of the people to accept."

Accordingly, Mr. Liang proposed in 1979 that the country adopt a more workable plan based on the two principal ingredients—xi and shao (longer spacing and few children)—of the Zhou Enlai fertility model of the early 1970s. Specifically, for the next several decades each couple would be allowed two children, provided that the interval between the two births would be strictly kept at 8 to 10 years. His plan also called for 30 percent of the couples to have only one child. But this provision was not to take effect until 1990, and would probably be more easily realized by education and propaganda rather than by strong administrative measures.

After a lapse of 10 years, with the actual survival of the first child, the family routine would crystalize around one child, and a proportion of the couples would voluntarily refrain from having a second child. Preferential treatment for one child would have more real meaning for those involved than in any universal one-child system.

Liang calculated in 1979 that implementation of his plan would yield a stationary population of 1.11 billion between 2010 and 2020—a figure that is now obsolete, considering that China's mid-1986 population is estimated to be 1.05 billion. But his arguments represented a point of view notably different from those behind the then-expanding population-planning efforts. The national goal established at that time was that by 1985 or so 95 percent of annual births in urban areas, and 90 percent of those in rural areas, should be first births. Evidence of the large notice that they received behind the scene soon appeared in various media, including the *People's Daily*,[9] giving point-by-point rejoinders.

## 8 to 10 Years Between Children?

With full elaboration, these arguments were internally circulated in 1983. With the express aim of finding an alternative to the one-child policy, Mr. Liang proposed that "for the next several decades, on the basis of promoting the 'one child per couple' practice during the initial several years, each woman be permitted to have two children, provided that the interval between births be extended to 8-10 years. That is, if a woman's age at first marriage is 20, the birth of the second child be delayed to age 30."[10]

Included in his proposal were population projections for 1984-2040 (see Table 2) based on the assumptions of (a) age at first marriage for woman at 20, (b) 90 percent of births surviving to marriageable and reproductive age, (c) 30 percent of the couples in each birth cohort bearing only one child, (d) comparatively favorable age-specific mortality rates of various developed countries, and (e) absence of nonmarriage or infecundity among women. The advantages of his plan, Mr. Liang stressed, are:

1. Annual population growth can immediately be limited to below 1 percent. Our country's population specialists are in a hurry to reduce population size. However, during the last few years, in spite of very large expenditures of effort, the TFR still is above 2.6. On the other hand, if this proposed strategy is adopted, the births occurring during the first 10 years would would actually be all single children. The birth rate would at once decrease.

2. Allowing people to have two children eliminates the masses' anxieties and makes planned reproduction truly voluntary acts among the masses.

3. Law must be quickly enacted so that the whole society has guidelines to follow in the area of reproduction. However, we still do not have concrete and systematic legislation in this area.

Continued on page 8

## Population Momentum

Continued from page 3

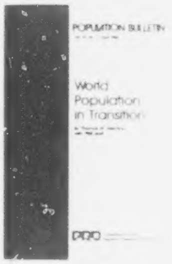
proportion of young people is very high, 40 to 50 percent. Even if fertility per woman were to drop with unprecedented suddenness to the low levels of today's MDCs, those countries would still continue to grow for many decades.

### Where We're Projected

If the world birth rate had remained at its 1970 level of 33 births per 1,000 population indefinitely, around 2100 world population would be passing the 150 billion mark. In reality, world birth rates have come down since then (to 27 per 1,000 population) and UN projections have consistently been based on the assumption that fertility rates will decline (or rise, in the case of low-fertility MDCs) to replacement level.

But because of population momentum, even given such assumptions, world population will continue growing for a long time after fertility has fallen. In fact, while rates may drop, the absolute increase will grow to an annual peak of 89 million between 1996 and 2000, according to the UN's medium variant projections. Its equivalent projection for earth's ultimate stabilized population is 10.2 billion late in the 21st century. So quantitatively, the mid-1980s could mark a halfway point for the world on its journey to ultimate population size.

## Why Momentum Matters



When the average fertility rate of a population reaches the replacement threshold, about 2.1 births per woman, one would expect births and deaths to be in balance. Eventually they will be, but not immediately. The reason for this is *demographic momentum*.

A population's age structure reflects its past pattern of demographic events—mortality, migration, and especially fertility. A population that has had very high fertility in the years before reaching replacement level will have a much "younger" age structure than a population with lower fertility before crossing the replacement threshold. The proportion of young people in a population approaching replacement level fertility is important because the size of the largest recently born generation as well as the size of the parent generation determine the ultimate size of the total population when births and deaths are finally in balance. Even after replacement level fertility is reached, births will continue to outstrip deaths so long as the generation that is producing births is disproportionately larger than the older generation where most deaths occur.

China, with a 1985 population of 1.04 billion and 34 percent under age 15, is among the handful of less developed countries with fertility even close to replacement level. China's total fertility rate was 5 to 6 births per woman as late as the early 1970s but dropped precipitously to 2.1 in 1984. Even with its aggressive fertility control program, China's population is expected to grow to 1.567 billion (a 51 percent increase over 1985) before stabilizing. Yugoslavia also recently reached replacement level fertility, but down only from a total fertility rate of 2 to 3 births per woman. Some 24 percent of its 1985 population of about 23 million was under age 15. Its population is projected to stabilize at about 30 million (30 percent over 1985) at the end of the next century.

*from Thomas W. Merrick, "World Population in Transition," PRB's April 1986 Population Bulletin*

## Demographer's Page

Continued from page 7

The main cause of this lies in the selection of a population strategy that violates the principle that a law should not punish everyone. A "two children per couple" strategy would eliminate the antagonism of the great majority of the people.

"4. For the generation born after liberation, this plan serves, in most cases, to prevent the absence of offspring to care for them in old age. This is a substantively important major issue in planned reproduction work at present, but one that unfortunately has been overlooked for many years. The proposed population strategy aptly offers a solution to this problem."

### Muddled Bathwater

Clearly, the vigorous implementation of the one-child policy during the recent past has not stifled dissent. The feedbacks from those affected may very well have fostered constructive debates in China. Behind the call for quick steps "to regain the initiative in planned reproduction work" lies, among other considerations, the fact that implementation of the one-child limit has become administratively ponderous.

For instance, from the start, exceptions to the one-child norm have been included in provincial and local family planning regulations. These exceptions have since become even more elaborated and numerous; regulations issued recently by a large municipality, for example, list varied exceptional cases that permit a second child, such as certain cases of couples with an adopted child, marriages of single children, marriage between minorities, returned overseas Chinese, or those who suffer from a certain level of disability.

To describe one regulation at length: More than one child is allowed for "rural couples (including those between women employed in agriculture and men in the urban sector):

(a) when one side is a single child;

(b) of uxorilocal [proximate to the wife's family] residence (when there are several sisters, only one receives permission);

(c) when one side suffers from deformities equivalent to the Second Level, B Grade disabilities among veterans.

"d. when one of the several brothers is infecund, but other brothers have one child each;

"e. who have borne a daughter and live in hilly areas of shallow soil, poor natural conditions, and labor-intensive production;

"f. in sparsely populated mountainous regions."

Information is lacking on the proportions of persons in the population who qualify for relief from the one-child limit. However there is no doubt that the many exceptions are a response to a widespread desire and need for a second child.

The conspicuous omission by Mr. Wang of any reference to the "one-child" policy underscores, albeit obliquely, that the second child has as large a presence as the first child in the minds of the people generally and of population specialists in particular. By the same token, it leaves the door wide open through which the one-baby policy can be thrown out with the administratively muddled bathwater. In its place, the architects of China's policy can, and likely soon will, renovate "ways of achieving socialist planned reproduction with Chinese characteristics" by including the spacing of the second child at a stipulated interval.

## References

1. Wang Wei, "Speech Delivered at the Fourth National Conference on the Science of Population," Shijiazhuang, Hebei, Nov. 19, 1985.
2. Liang Zhongtang, "On Our Country's Population Development Strategy During the Next Several Decades," Paper presented at the Second National Conference on the Science of Population, Beijing, December 1979.
3. "Chen Muhua, Bo Yibo Speak at Family Planning Meeting," Xinhua-English, Beijing, Feb. 2, 1980.
4. Song Jian et al., "On the Goal of Our Nation's Planned Population Growth," *People's Daily*, Mar. 7, 1980.
5. Liang Zhongtang, "Global New Technological Revolution and Our National Population Response," 1983.
6. People's Government of Xian Municipality, Document No. 031, October 1985.

# POSITIONS/PROFESSIONALS

**Postdoctorate Research Fellow, Research or Visiting Assistant or Associate Professor** for Brown University's new Alan Shawn Feinstein World Hunger Program. This four-year program will emphasize fundamental understanding of the prevalence, persistence, and prevention of hunger, and will focus particularly on long-term trends in climatology, demography, economics, technology, and values. Research is carried out collaboratively with other institutions that share its concerns and among a small (3-5) resident group.

The World Hunger Program invites applications for appointments to the resident group (beginning September 1986 or earlier, with terms negotiable) in either of two categories: (1) Postdoctoral Research Fellow and (2) Research or Visiting Assistant or Associate Professor. In addition, the program welcomes inquiries for appointment as Visiting Scientists and Scholars (with some independent support). Appointments will be made beginning May 1, 1986.

Submit statement of interest, a vitae, and names of three references to: Robert W. Kates, Director, Alan Shawn Feinstein World Hunger Program, Brown University, Box 1831, Providence, R.I. 02912.

# POPULATION UPDATE

## Estimated United States Population

| | |
|---|---|
| As of November 1, 1985 | 240,123,000 |
| As of November 1, 1984 | 237,869,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 981.

## Estimated World Population

| | |
|---|---|
| As of April 1986 | 4,921,000,000 |
| Annual Growth | 83,000,000 |

Estimated by extrapolation of the mid-1986 world population given on PRB's 1986 World Population Data Sheet.

## Latest Provisional Statistics for the U.S.: November 1985

| Item | 12 months ending with November<br>Number<br>1985 | <br><br>1984 | <br>Rate<br>1985 | <br><br>1984 | <br><br>1983 | <br><br>1982 |
|---|---|---|---|---|---|---|
| Live births | 3,758,000 | 3,673,000 | 15.8 | 15.6 | 15.6 | 16.0 |
| Deaths | 2,087,000 | 2,040,000 | 8.8 | 8.6 | 8.6 | 8.6 |
| Natural increase | 1,671,000 | 1,633,000 | 7.0 | 7.0 | 7.0 | 7.4 |
| Marriages | 2,423,000 | 2,474,000 | 10.2 | 10.5 | 10.5 | 10.8 |
| Divorces | 1,185,000 | 1,160,000 | 5.0 | 4.9 | 5.1 | 5.1 |
| Infant deaths | 39,300 | 39,100 | 10.7 | 10.6 | 10.9 | 11.3 |
| Population base (in millions) | | | 238.1 | 235.9 | 233.5 | 231.3 |

Note: Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

Source: *Monthly Vital Statistics Report* (Vol. 34, No. 11) from the National Center for Health Statistics.

## African Family Planning

*Continued from page 4*

rate [6 births per woman, she estimated, against the 1984 survey's 6.5 and the government's current 5.6 estimates] will start to decline in the next decade. People are so conscious of the high cost of children—feeding them and especially school uniforms and fees [10 to 15 Zimbabwean dollars per term for primary school]."

Across the border in France-sized Botswana, unlike Zimbabwe not fully recovered from drought, high child costs are also on people's minds, said Dr. N.N. Mashalaba, family planning pioneer in the mid-1960s and head of the government's program from 1973 to 1983. Now in private medical practice, she had brought along for tea at Gaborone's leading hotel her successor as head of the Ministry of Health's Family Health Division and family planning leaders from the YWCA, Red Cross, Christian Women's Fellowship, and the government's Women's Affairs department. "You should have been here last month," one said. "That's the time to pay school fees [U.S. $7 to $12 a year for primary school] and everyone was complaining. That's the reason we're all having fewer children than our parents did—even in rural areas."

Added another: "Most women go out to work—selling cooked foods or baskets they've made besides doing fieldwork in rural areas—and nowadays we can't rely on aunts and grandmothers for child care."

Botswana's 1984 Family Health Survey had found a 19-percent modern contraceptive prevalence rate, second only to Zimbabwe's in sub-Saharan Africa (see *PT*, December 1985). The six women were sure it would soon go much higher with a strong government family planning program fully integrated with maternal and child health services, covering the country's scattered 1.1 million people through some 400 clinics and more than 600 family welfare educators. But they were concerned about rising teenage pregnancy and all were planning programs to try to reach adolescents.

"Developing countries get asked to grow up too fast," said Dr. Mashalaba. "We feel under pressure from outsiders to do it quickly when they should look at how long it took developed countries to bring down their family sizes." Then she added: "Maybe it's not this generation that will change, the one we're trying to reach now, but the next generation will."

# TAKE A NUMBER

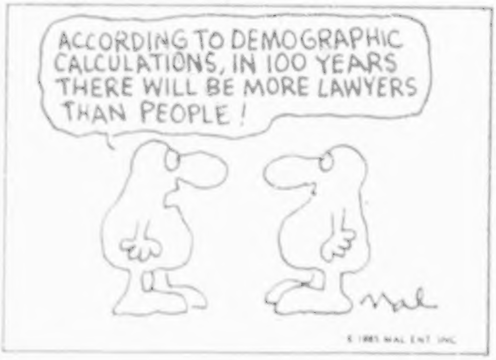
**Illegal Flow Officially Estimated:** Beginning with the estimate of total U.S. population for Oct. 1, 1985, the Census Bureau has made some noteworthy changes in its monthly intercensal estimates. Annual net emigration is now assumed to be 160,000 per year, up from the 36,000 which had long been used. This amounts to a net addition to the "minus side" of the ledger of 124,000. The new figure is based on internal Census Bureau studies which took such factors into account as Social Security recipients living outside the U.S. On the plus side of the equation, it is now assumed that net illegal immigration amounts to 200,000 per year, a figure that never before was taken into account. This too is based on Census Bureau studies and demographic analyses. These two factors result in a net increase of 76,000 in the amount by which U.S. population grows each year. By Dec. 1, 1985, U.S. population was estimated at 240,299,000 (including armed forces overseas), an increase of about one-half million over what the estimate would have been under the older set of assumptions.

**Birth Rankings:** Where are more babies born in the world than anywhere else? This type of question is not an infrequent one at PRB, so herewith are the current top ten countries by the number of births. Developing countries' numbers are estimates, of course, but under close scrutiny these rankings should hold up well.

| | | *Annual Numbers of Births* |
|---|---|---|
| 1. | India | 27,500,000 |
| 2. | China | 18,400,000 |
| 3. | Indonesia | 5,700,000 |
| 4. | USSR | 5,500,000 |
| 5. | Nigeria | 5,100,000 |
| 6. | Bangladesh | 4,600,000 |
| 7. | Brazil | 4,400,000 |
| | Pakistan | 4,400,000 |
| 9. | United States | 3,800,000 |
| 10. | Mexico | 2,600,000 |

**Update on U.S. Hispanics:** The Census Bureau has released its first estimate of the U.S. Hispanic population for the mid-1980s which is consistent with the 1980 Census count. For March 1985, there were an estimated 16.9 million Hispanics in the U.S., a 16-percent increase over the 1980 Census count of 14.6 million. At 28 percent, Puerto Ricans and Cubans had the largest percent increase, but a large number of Cubans had arrived during the Mariel Sealift shortly after the 1980 Census was taken. According to these estimates, Hispanics now comprise 7.2 percent of the total population, up from 6.4 in 1980. While Hispanics' median age is less than that of the general population, 25 years vs. 32, Hispanics too have "aged" from their 23.2 median age in 1980. —*J.B.*

# ADDENDA


ACCORDING TO DEMOGRAPHIC CALCULATIONS, IN 100 YEARS THERE WILL BE MORE LAWYERS THAN PEOPLE!
Mal
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# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to: Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

## THE IMMIGRATION TIME BOMB

by Richard D. Lamm and Gary Imhoff. New York: Dutton, 1985. 271 pages. $18.95. ISBN 0-525-24337-2.

The longest part of this book details arguments that "legal and illegal immigration are out of control," posing serious problems to American society. The chapter titles outline the important areas: "How many can America absorb?," "The dispossessed," "Lawlessness," "The splintered society," "Language: the tie that binds," "Jobs, immigrants, and Americans," and "Social services, aliens, and Americans."

The authors also present a series of recommendations as to how immigration laws and procedures should be changed to bring immigration back under control. The most important are:

- Establish now a firm and comprehensive annual ceiling of 400,000-450,000 for *all* categories of legal immigration, including refugees.
- Establish demographic, economic, and social criteria on which to base, in the future, a fluctuating ceiling for immigration.
- Use sanctions to stop employers from employing illegal aliens.
- Improve the management, resources, and policies of the INS and the Border Patrol.

Conspicuously absent from this list is an amnesty or legalization provision. Lamm, currently the Democratic governor of Colorado, and Imhoff observe that amnesty for illegals already in the U.S. has been the highest priority for opponents of immigration reform.

The tone of this book, and of course its title, remind one of Paul Ehrlich's *The Population Bomb*. The authors view world population growth with alarm and say that "Pressures to immigrate to the United States have to be stopped domestically by American laws and American enforcement of those laws, because in the countries of the developing world the pressure to emigrate will continue to grow as their population explodes. Without action on our part, that pressure may prove to be irresistible."

Although "immigration" is in the title, the book is mostly about only one kind of immigration: illegal. It adds nothing new to the debate on immigration reform, but it does a good job of summarizing the issues involved and the arguments for one side. Lamm and Imhoff have a certain viewpoint to present, and they do it thoroughly. It is a valid viewpoint and they do give space to opposing points of view. I would not, however, expect pro-growth advocate Julian Simon to agree with much of the discussion in this book.

—*Bob Gardner*

## ASIA-PACIFIC REPORT: Trends, Issues, Challenges,

by The East-West Center. Honolulu, Hawaii: The East-West Center, 1986. 104 pages. $10.00. ISBN 0-86638-071-X.

Honolulu's East-West Center recently celebrated its 25th anniversary and, to mark the occasion, has produced the *Asia-Pacific Report* (the first of a series) designed to establish some baselines for the region's development and identify critical policy issues for the years ahead. This region, which encompasses the Pacific island states in the east, Japan and China in the north, and Australia and New Zealand in the south, includes 56 percent of the world's people living on 19 percent of its land area and grouped into 33 independent countries and several territories.

The report begins with broad overviews of the political and economic characteristics within the region, followed by discussions of the world economy, population trends and demographic change, sustainable use of renewable resources, and the mineral and fuels future. The conclusion focuses on the challenges facing the region: 75 percent of the people live in low-income countries that face enormous obstacles to development, population growth continues to be high in much of South Asia, and millions of new jobs must be created in both urban and rural areas.

Charts, graphs, tables, and sidebars are freely dispersed throughout this compendium of information and data for the Asia-Pacific region. It does for the area what the *World Bank Development Report* does for the world. A laudable first effort at a reasonable price.

—*Denise Molajo*

## Books Received

**CANADIAN ALMANAC AND DIRECTORY 1986,** 139th edition, edited by Susan Bracken. Toronto: Copp Clark Pitman (dist. by Gale Research, Detroit, Mich.), 1986. 1,237 pages. $68.00.

**CATALOGUE OF ESCAP POPULATION PUBLICATIONS: Through 1985,** by the Economic and Social Commission for Asia and the Pacific, United Nations. New York: United Nations. 43 pages.

**THE FAR EAST AND AUSTRALASIA 1986,** 17th edition. London: Europa Publications (dist. by Gale Research, Detroit, Mich.), 1985. 989 pages. $145.00.

**HOW TO CONDUCT SURVEYS: A Step-by-Step Guide,** by Arlene Fink and Jacqueline Kosecoff. Beverly Hills, Calif.: Sage, 1985. 119 pages.

**HUMAN MIGRATION** (Scientific Geography Series Vol. 7), by W. A. V. Clark. Beverly Hills, Calif.: Sage, 1986. 96 pages.

**LINKING DATA** (Qualitative Research Methods Series 4), by Nigel G. Fielding and Jane L. Fielding. Beverly Hills, Calif.: Sage, 1986. 96 pages.

**SOCIO-ECONOMIC DIFFERENTIALS IN CHILD MORTALITY IN DEVELOPING COUNTRIES** (ST/ESA/SER.A/97), by the Department of International Economic and Social Affairs, United Nations. New York: United Nations, 1985. 319 pages.

**STATISTICAL INDICATORS ON YOUTH** (ST/ESA/STAT/SER.Y/1), by the Department of International Economic and Social Affairs, Statistical Office and Centre for Social Development and Humanitarian Affairs, United Nations. New York: United Nations, 1985. 202 pages. $15.50.

**STATISTICAL YEARBOOK 1985,** by the United Nations Educational, Scientific and Cultural Organization. Brussels: UNESCO (dist. by UNIPUB, Ann Arbor, Mich.), 1985. 951 pages. $78.49.

# SPOTLIGHT

## FINLAND

**Population (1986 est.):** 4.9 million
**Land area:** 130,160 sq. miles
**Births per 1,000 pop. (1984):** 13
**Deaths per 1,000 pop. (1984):** 9
**Rate of natural increase (1984):** 0.4 percent
**Total fertility rate (1984):** 1.7
**Infant mortality rate (1984):** 6.6 infant deaths per 1,000 live births
**Life expectancy at birth:** 74 years
**Per capita GNP (1983):** US $10,710
**Capital:** Helsinki

### by Janine Adams

Finland lies far to the north—one-third of its area rests above the Arctic Circle. Dense forests cover 70 percent of Finland's land area, making forestry a relatively important source of national wealth.

Finland connects the Scandinavian peninsula to the great land mass of eastern Europe, and its geography has been a significant factor shaping its destiny. Finland gained independence from its easterly neighbor, the Soviet Union, in 1917 (it fought off Soviet advances during World War II). Since World War II, it has maintained close relations with both the Soviet Union and its neighbors to the west on the Scandinavian peninsula in order to pursue a policy of neutrality. Its basic foreign policy goals have been to stay out of superpower conflicts and to build mutual confidence with the USSR.

Finland's 5-million population is the second largest on the Scandinavian peninsula (behind Sweden's and ahead of Norway's). Most Finns live in the country's south, where winter climatic conditions are less harsh. But even Helsinki (population 483,000) lies at about the 60th parallel, and summer temperatures there seldom exceed 75 degrees Fahrenheit.

Finland has two official languages: Finnish, spoken by over 92 percent of the population, and Swedish, the language of Finland's first colonizers. Sweden and Finland shared a relationship which lasted nearly 700 years, beginning in the 12th century, and ending in 1809 when Finland was conquered and made part of the Russian Empire. The Swedish-speaking minority in today's Finland represents remnants of a once politically and socially dominant aristocracy. The two official languages are in no way related (they differ from one another more than English and Russian). Finnish is a Finno-Ugric tongue (as are Hungarian and Estonian), while Swedish is an Indo-European language.

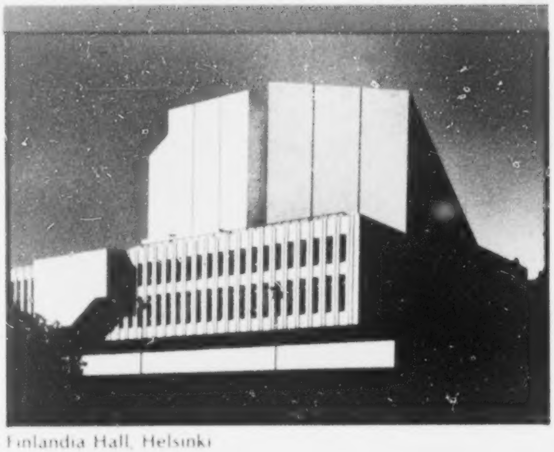
Finland has recorded the world's lowest infant mortality rate (IMR), at 6.0 infant deaths per 1,000 live births in 1982. Since that time Finland's rate has increased to 6.6, as of 1984 (a difference of about 400 infant deaths annually), and the lowest national IMR presently recorded is 6.2 (in both Japan and Iceland). These low rates make one wonder how low an IMR can really go. It is at least suggested that 6.0 is about as low as human efforts can make it—that many children may be lost as a result of genetic factors.

The vast majority of the Finnish population (over 90 percent) belong to the Evangelical Lutheran Church. The Eastern Orthodox Church, evidence of past Russian cultural influence, has the status of second national church, while there are small groups of Roman Catholics, Methodists, Jews, and other religious sects.

Education and literacy are very important in Finland, where as early as the 17th century, Finns had to prove their reading ability before they were allowed to marry. In the mid-1970s the educational system was reformed with the goal of equalizing educational opportunities. Tuition is free through the university level and instruction is the same for all students. Poetry has an important place in Finnish national consciousness; the country has its own "national epic," the *Kalevala*, a collection in modern Finnish of traditional myths and legends.

Finland's indigenous population, the Lapps, were driven to the northern part of that country by the first settlers in Finland, the ancestors of the present-day Finnish speakers, who emigrated gradually in small groups to Finland from Estonia across the Gulf of Finland, during the first eight centuries A.D. Lapland, the region now occupied by the Lapps, includes largely Arctic sections of Norway, Sweden, and Finland, and the Kola Peninsula of the USSR. It has never been defined as an autonomous state or country, for the Lapps never developed such a political organization. As in Finland, the language of the Lapps is Finno-Ugrian.

Of the roughly 50,000 persons who can be identified ethnically as Lapps, about 4,000 are found in Finland (20,000 reside in Norway, some 17,000 in Sweden, and some 9,000 in the Soviet Union). The Lapps migrate freely within the region between the various countries. The Lapps' celebrity as reindeer herders is a misconception. Reindeer herding was never a dominant characteristic of the Lapps' economy. Today, most Lapps are farmers and fishermen, or are employed in mining and logging.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# POPULATION TODAY

Vol. 14, No. 5 May 1986

## FEATURES

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Applied demography and applying "the invisible hand" to population growth were two hot topics at demographers' annual conclave

4 **U.S. abortion figures dip**
Guttmacher Institute estimates that totals and rate have dropped since 1982

4 **And Cuban abortions increase**
New 1984 statistics show Cuba's abortion ratio at 849 per 1,000 live births

4 **Internal Revenue Service taxed by demographic trends**
Quantity, variety of income tax returns complicate IRS's task, PRB *Trends* paper finds

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Intravenous drug use seen as significant vector

9 **When country populations finally stabilize**
Nigeria could end up with over 500 million, according to the latest World Bank projections

9 **David E.C. Eversley chosen**
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Center for Immigration Studies (CIS) will focus on population flow to U.S.

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RICE RONI

Linda Fay

PAA climbed halfway to the stars in San Francisco last month. See page 3.

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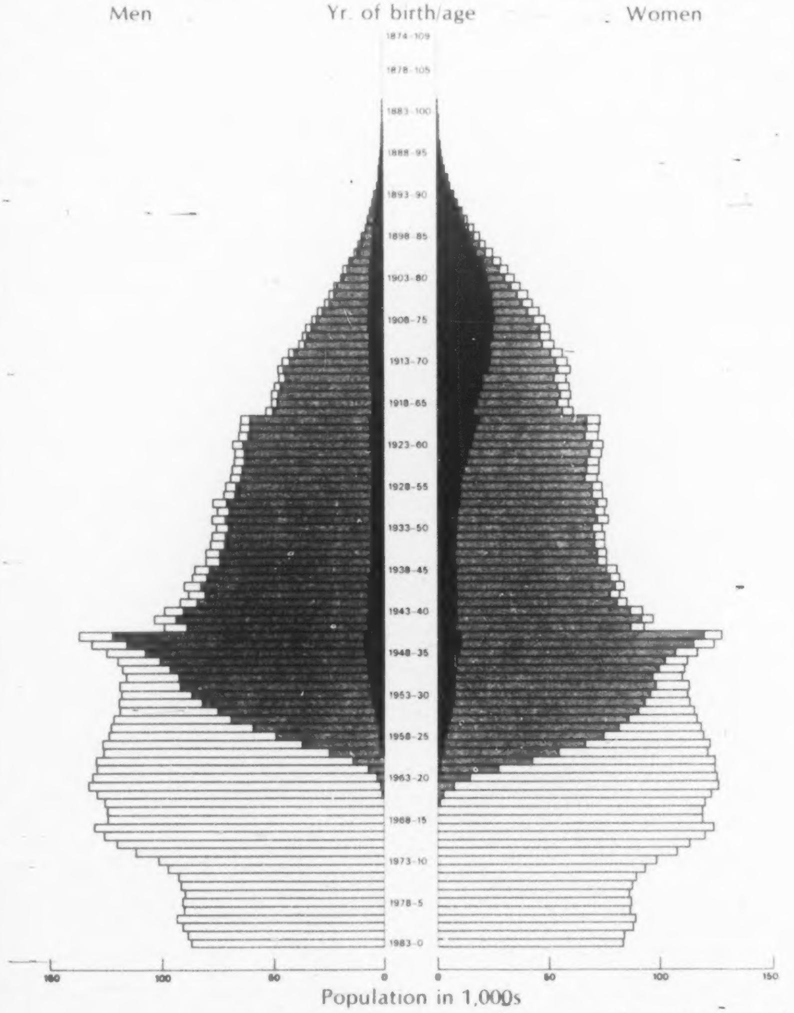
# FROM THE EDITOR'S DESK

NOTES OF A PAA PHOTOGRAPHER: It's no picnic photographing an overhead transparency of a multiple regression ... There goes Peter Morrison at f2.8 ... Wish the lights in these corridors were brighter ... If only PAA audiences would wave a few torches and pitchforks now and then ... Need to snap candid portraits for Jean van der Tak's PAA Archives ... There goes Reynolds Farley at f5.6 ... Maybe Jean could use a shot of the sun-drenched Golden Gate, or Fisherman's Wharf at f22 ... Here's the panel on whither U.S. population policy. Wish that chandelier would come back on ... Keep together, keep looking this way ... Click!

*– Art Haupt*

# SPEAKING GRAPHICALLY



*PT* presents another popular single-year population pyramid. Here, the pyramid of the Netherlands for 1984 clearly shows the demographic effects of two wars, although it reflects decreases in births during wartime more than increased mortality (the Netherlands was neutral in World War I). The shaded areas also show the population by marital status, the lightest area showing those never married and the darkest, widows and widowers.

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*Educators and students should send supporting documentation

# The Invisible Hand In San Francisco

Over 1,000 population enthusiasts found their way to San Francisco for the 1986 meeting of the Population Association of America April 3-5. This was a high attendance for a West Coast meeting in a Gramm-Rudman-Hollings year – whether because of the city's charms, or because demographers naturally flock to a place where the topography resembles 3-D computer graphics and the bridges look like bimodal distributions.

There was a lot at PAA to talk about and listen to. A record 76 sessions took place at the Sheraton Palace Hotel, including six 90-minute sessions after dinner Thursday night. Over 200 papers were presented. And during the presidential address, Adam Smith's "invisible hand" was highly visible.

## Pre-Meetings

**APLIC**. Population librarians, members of the Association for Population/Family Planning Libraries and Information Centers-International (APLIC) traditionally meet just before a PAA meeting. This year the 36 attendees participated in a number of sessions emphasizing computers and libraries. Linda Mullins (Hewlett-Packard Corp. Library) gave the keynote address on "Applying Mini/Micro Computer-Based Systems in Small Libraries," and one group of panelists shared their experiences of hard- and software purchases. Outgoing APLIC president Gloria Roberts (PPFA) welcomed the new president-elect Judy Mahachek (Johns Hopkins Univ.).

**Psychosocial Workshop**. Although started by population psychologists 14 years ago, this two-day pre-PAA meeting now attracts a broad cross-section of demographers, sociologists, economists, anthropologists, and family planning programmers, with its relaxed give-and-take and single sessions – a throwback to PAA meetings of yore.

For many participants the Psychosocial Workshop offers a staging ground for research ideas and reports, often subsequently elaborated on in papers delivered in formal PAA sessions – to perhaps less friendly attention. Topics featured in this year's sessions included the ever-challenging problem of adolescent pregnancy (and how to reach male partners); new possibilities for family research afforded by expanding data bases; working mothers' child-care problems, which Harriet Presser (Univ. of Maryland) viewed as a major reason for low fertility in the U.S. and elsewhere; and dimming prospects for NICHD and AID population research funding in the current federal budget-cutting climate. Psychologist Toni Falbo (Univ. of Texas, Austin) reported on the pilot testing of a questionnaire she developed for China's government to study classroom achievement and personality differences between only and "non-only" children (sole significant difference: only children weighed more).

## PAA Sessions

Sexual activity of teenagers was a major topic of the session on "Fertility: Early and Late," organized by Jane Menken of Princeton Univ. (with the Univ. of Maryland's Harriet Presser acting as both discussant and chair owing to Menken's laryngitis). Reporting on first premarital contraceptive use, William Mosher and Christine Bachrach (NCHS) found that contraceptive use at first intercourse varied little between the early 1960s and the late 1970s, but jumped in the early 1980s. This jump was explained by increased condom use – perhaps the result of the increased national awareness of herpes that characterized the early 1980s.

Leo Morris (Centers for Disease Control), reporting on a survey of young adults in Mexico, said that about 22 percent of young women there used contraception at first intercourse. Interestingly, this figure was nearly identical to that for Hispanic women in the U.S. as reported by Mosher and Bachrach.

The "Opportunity Cost of Raising American Children" takes its toll on female labor force activity and earn-

*Continued on page 6*

# U.S. Abortions Continue to Edge Down

Since 1982, U.S. abortion totals have been inching downward, after nearly a decade of increase, according to new statistics from the Alan Guttmacher Institute (AGI). Total annual abortions are estimated to have dropped from 1,574,000 in 1982 to 1,515,000 in 1983 and 1,508,000 in 1984, representing a decline of more than 4 percent during the two-year period.

The corresponding abortion rate has also dropped. The 1984 figure was 26.9 abortions per 1,000 women aged 15-44, as compared with 28.8 in 1982 and 27.4 in 1983, a decline of 5 percent. (The percentage difference is larger for the abortion rate than for the total number of abortions because the number of women of childbearing age rose slightly during that period.) The abortion rate rose for most of the 1970s, then leveled off around 1979. The 1983 figure shows the first significant decline.

According to Stanley K. Henshaw, deputy director of research for AGI, in *Family Planning Perspectives* (January/February 1986), "The decline in the abortion rate in 1983 is evidently not attributable to a shift in favor of women's carrying their unplanned pregnancies to term," since an increase in births did not accompany the decrease in abortions. Thus, the decline in the abortion rate reflects a decrease in the pregnancy rate.

The abortion ratio, or number of abortions per 1,000 abortions-plus-live-births (AGI's definition), declined slightly in this time period, to 287 in 1984, down from 299 in 1982 and 294 in 1983. This means that when only abortions and births are considered, about 29 percent of pregnancies are terminated by abortion. When miscarriages and stillbirths (estimated as comprising 10 percent of abortions plus 20 percent of births) are taken into account, 25 percent of pregnancies end in induced abortion.

Henshaw points out that these data are estimates, based on AGI's last complete count in 1982; also the 1984 estimates may be slightly less accurate than those for 1983, due to a smaller sample. The next AGI survey of abortion providers is planned for spring 1986. *—J.A.*

# Sad Returns for the IRS

Changing demographic factors in the U.S. are reshaping society in general; one American institution most affected by these changes is the U.S. Internal Revenue Service (IRS).

The job of processing some 104 million individual tax returns is already fairly daunting. But it will become more difficult in future years, as more and increasingly complex returns are filed, according to "Demographic Trends Tax the IRS," the latest issue of PRB's *Population Trends and Public Policy* series. In the report authors Peter Morrison of the Rand Corporation and Paola Scommegna of PRB examine the trends affecting tax collection from a policy perspective.

Increases in divorce and remarriage, single parent families, dual-earner couples, and retirees working part-time are among the trends resulting in a complex web of individual tax returns.

More separate households mean more tax returns. Compared to households 20 years ago, today there are a greater proportion of childless couples, children living with one parent, people living alone (elderly widows in particular), and unrelated people living together. The legions of divorced and remarried individuals present the IRS with compliance problems, as parents who do not have child custody claim exemptions or as parents continue to claim dubious exemptions after they remarry.

The proportion of high-income families has jumped with the increasing number of high-earning wives. The number of taxpayers with an income over $50,000 has risen steadily in recent years, growing from 2.2 million in 1980 to 6.9 million in 1984. By 1992, 18.6 percent of all individual tax returns are expected to top the $50,000 mark, another result of the aging of the baby boom.

These high-income taxpayers are costly for the IRS – they tend to make more errors in their calculations (presumably because of the variety and complexity of their sources of income) and they tend to file itemized 1040 forms which cost the IRS 28 percent more to process than the 1040A forms.

The IRS's ability to process the more complex tax returns of the future will be affected by the changing age mix of the population. The IRS itself has a higher-than-average proportion of baby boomers in its own work force. In future years, this large number of baby boomers will have to compete for fewer upper-level positions. With limited opportunity for advancement the IRS may lose some of its most qualified workers, just when they are most needed. At the same time, a shortage of entry-level workers is foreseen, as the relatively small baby bust generation enters the labor force. *—J.A.*

Copies of "Demographic Trends Tax the IRS" (16 pages) are available for $3.00 per single copy, 2-10 copies, $2.30 each, 11-50 copies, $1.90 each, 51 or more, $1.50 each. Orders of $20 or less must be prepaid and include $1.00 for postage and handling. Send order and remittance to Circulation Dept., PRB, P.O. Box 35012, Washington, D.C. 20013. Make checks payable to PRB.

# Cuban Abortions Still High

Cuba continues to show a high incidence of abortion, according to the latest statistics made available in March 1986 by that country's Ministry of Public Health.

Since 1964, free hospital abortions have been available on request for women during the first 10 weeks of pregnancy. Subsequent years have seen recorded abortions rise to nearly equal the number of live births. (As a comparison, the U.S. abortion ratio per 1,000 births was 416 in 1983.)

| | **1983** | **1984** |
|---|---|---|
| Live births | 161,692 | 164,323 |
| Birth rate (per 1,000 pop.) | 16.4 | 16.6 |
| Legal abortions | 124,791 | 139,588 |
| Abortion ratio (Legal abortions per 1,000 live births) | 772 | 849 |
| Other abortions (therapeutic and diagnosed) | 44,574 | 46,542 |
| Total abortion ratio (total abortions per 1,000 live births) | 1,047 | 1,133 |

*Source:* Cuban Ministry of Public Health, March 1986.

# AIDS Cases Reach 20,000

As of May 5, 1986, the number of U.S. cases of AIDS (acquired immunodeficiency syndrome) stood at 20,305 (93 percent male), according to the Centers for Disease Control. The total number of people who have died of AIDS in the U.S. was 10,933.

In the U.S., the disease most commonly affects homosexual men. Some studies suggest that this group has substantially decreased promiscuity because of the threat of AIDS. Yet the disease continues to spread, because its base of prevalence is wider than in earlier years, and also because intravenous drug use seems to be a greater factor in contagion than earlier thought.

The number of asymptomatic cases (infected people who show no symptoms) is estimated at between 500,000 and 1 million. The propensity of this larger population to develop the active disease is imperfectly understood. However, research suggests that people can be silently infected for years before becoming ill with AIDS. Some estimates are that perhaps 5 to 20 percent of these will ultimately develop the disease.

According to the CDC, the doubling time of AIDS cases continues to be about a year. The first AIDS cases in the U.S. were reported in June 1981. *—A.H.*

# Immigration Key Issue in French Elections

Population issues entered the French elections held Mar. 17, 1986. While two major conservative parties were winning a one-seat majority in the 577-seat National Assembly, the right-wing National Front won 33 seats and potential strength as a swing vote.

Immigration questions have cropped up in recent French political debate, with some politicians calling for money incentives to encourage North African immigrants to emigrate. Founded 13 years ago, the right-wing group ran on a platform that consisted almost exclusively of proposals for restricting immigration.

Its leader, Jean-Marie Le Pen, ostracized by the mainstream conservative parties for his extreme views, has called for immigrants to be compelled to return to North Africa. *—A.H.*

# SURVEY REPORT

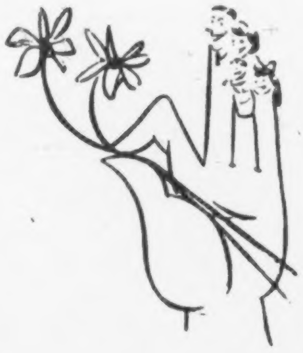
## Tunisia

"Two children per couple" appears to be the message of the logo below on the cover of the 1983 Contraceptive Prevalence Survey of Tunisia. This survey was conducted by the National Office of Population and the Family with the assistance of Westinghouse Public Applied Systems in order to measure the use of family planning in Tunisia.

Tunisia's population of about 7.2 million has enjoyed some measure of prosperity since the 1970s, spurred in part by oil exports, but many development challenges remain. The economy is also augmented by the remittances of about 450,000 workers abroad and by tourism. In recent years, however, tourism has declined due to economic conditions in Europe, and the current drop in the price of oil exacerbates this.

Nearly two-thirds of this Missouri-sized country is suitable for some form of agriculture, although crops are highly rain-dependent due to the lack of irrigation. The government has begun ambitious agricultural programs to reduce the need to import cereals and thereby reduce the negative trade balance.

Tunisia has had a policy to reduce high birth rates since 1966. Initially this policy met with success, but recent trends indicate that Tunisia may be one of the developing countries to experience a slowdown in its fertility decline. (For a more complete discussion of this issue, see *PT*, September 1984.) The total fertility rate (TFR) did drop from about 7 children per woman in 1966 to about 5 in the late 1970s, but appears to have remained at that level since. In the meantime, the rate of population growth has decreased only from 3 percent in 1966 to about 2.7 percent in the early 1980s as death rates have declined in concert with birth rates.



Knowledge of family planning is an obvious prerequisite to lowering the birth rate and it is virtually universal among the sample of ever-married Tunisian women interviewed in the 1983 survey. Fifty-six percent of the women had actually used modern contraception at some time, a notable increase from the 40 percent of a 1978 survey. The IUD and pill led among contraceptive methods ever used at 29 and 28 percent, respectively, with the IUD showing the largest increase since 1978. At the time of the survey, 41 percent of the women were actually using a modern method, a 10-point increase over 1978; nearly all of that increase was caused by IUD insertions and female sterilizations as the pill fell into some disfavor.

At least for the present, Tunisia may represent a case in which the widespread availability of family planning may allow women to reduce their fertility to some lower level, but one that is far above the two-child family required for the eventual end of population growth. On average, the women said that they desired about 4.8 children, roughly equal to the present TFR. This varied from 5.3 in the rural areas to 4.4 in urban areas. There is some suggestion, however, of lower fertility in the future since the younger women said that they desired from 3.7 children (ages 15-19) to 4.0 (ages 25-29). Given the general pattern of lower family size among women of better education, it may be that continuing efforts in education will reduce the desired number of children. At present about three-quarters of Tunisian women are illiterate. *—C.H.*

The charming Sheraton Palace; Peter Morrison, Sharon Camp and Alison Rosenberg

## PAA Report

*Continued from page 3*

ings as reported by Charles Calhoun and Thomas Espenshade of the Urban Institute in a session on "Economics of the Family." Cost effectiveness of family size for women was also assessed in the same session by Ellen Shapiro Fried and Susan Settergren (Research Triangle Institute) in "The Effects of Children on Wives' and Husbands' Allocation of Time." Role identity is important in determining spouses' time use. While wives, employed or not, allocate their time according to the number and age of their children, husbands devise their schedules according to their attitudes toward home work.

Further investigation of the effects of marriage and fertility on behavior was reviewed in a session entitled "Trends in Household Composition and Living Arrangements." A delightfully diverse session, its papers ranged from "Moving Out and Marriage: What Do Young Adults Expect?" by Calvin Goldscheider and Frances Kobrin Goldscheider (Brown Univ.), which concluded that 70 percent of high school seniors aspire to establish their premarital independence, to papers on family economic well-being by Martha Hill, Greg Duncan, and Willard Rodgers of the Univ. of Michigan and "The Households of Older Unmarried Women" by Douglas Wolf (Urban Institute) and Beth Soldo (Georgetown Univ.). Suzanne Bianchi (Census Bureau) and Judith A. Seltzer (Univ. of Wisconsin-Madison), in a paper on children's contact with their absent parents, reported that while two-thirds of American children live with both biological parents, this will be less true in the future. Their preliminary results promise good reading later this year.

Turning to crime, the session "Demography of Crime and Justice" gave the demographic answer to such questions as: Is the crime rate really falling? Darrell Staffensmeier and Miles D. Harer (Pennsylvania State Univ.) concluded that the answer is yes, though violent crime seems to be dropping at a slower rate than property crime. An Easterlin effect on crime was considered, as was the effect of demographic aging on crime – not only because an older society is less criminal-prone, but less victim-prone as well (the young are more likely to be victims!).

With immigration reform and concern about illegal immigration on the forefront in Congress, the five papers on "Undocumented Migration: Measurement, Patterns, and Responses," chaired by Jeffrey Passel (Census Bureau), were quite timely. J. Edward Taylor of the Urban Institute found that undocumented migrants receive perhaps 20 percent less in wages for equivalent jobs, of which only 8-30 percent can be accounted for by their illegal status per se. U.S. agriculture was where the wage differential was greatest; hence this sector should be most susceptible to change should immigration reforms and amnesty be implemented.

### The Panels

PAA panel discussions (sans papers) are often the hotbeds of important demographic topics, and this year was no exception.

Opinions in a panel on the future of U. S. international population policy were sharply divided. Agency for International Development representative Alison Rosenberg outlined the re-examination of the Agency's population program that had taken place since the population conference in Mexico City in 1984. She stressed AID's continued commitment to voluntary family planning and the provision of access to a range of services as part of broader Agency priorities on child survival and free enterprise. Ben Wattenberg of the American Enterprise Institute challenged the view that recent shifts in AID policy were concessions in the face of a right wing cabal against family planning and said that he felt confrontation about population policy was a good thing. But Sharon Camp (Population Crisis Committee) and Susan Cohen (Alan Guttmacher Institute) were not so optimistic. Camp characterized the redirection of AID policy as "anti-Malthusian, anti-abortion, anti-target, and anti-government." She predicted serious adverse effects on the quality of family planning programs if these policies remain in place. Cohen cautioned about the adverse effect of having extremists on the population issue situated in key policy positions and called for a return to the middle ground on which the discussion of policy had been based before the 1980s.

"Monumental" was the adjective repeated most often in a panel session on Princeton University Office of Population Research's study of the European fertility transition. Initiated in the early 1960s, the project has examined fertility trends in Europe on a province-by-province basis in relation to cultural, social, economic, and political changes during the course of the European demographic transition. Beginning with its first monograph published in 1971, the project has produced seven major volumes, culminating in a recently published summary volume co-authored by Ansley Coale (Princeton) and Susan Cott Watkins (Univ. of Pennsylvania), along with numerous published articles and conference papers. Panelist Warren Sanderson (SUNY Stony Brook) likened the commemorative panel to an academic bar mitzvah for the project's coming of age in the world of major contributions to knowledge.

Other panelists commented on the

POPULATION REFERENCE BUREAU
for the educat
eryone...
Reynolds Farley; PRB's booth; John Bongaarts receives the Mindel Sheps award.

fruitful cross-fertilization that had occurred between the Princeton study on Europe and recent work on fertility trends in less developed countries (LDCs), including the point that recent insights regarding LDCs have contributed to the understanding of changes in Europe.

Another panel was devoted to a discussion of the controversial just-published National Academy of Sciences, *Population Growth and Economic Development: Policy Questions*. The report, considered by some a "revisionist" view of rapid population growth as a serious drawback to economic development in LDCs, instead concludes that slower population growth could merely be "beneficial" and emphasizes market adaptive responses to population pressures.

Paul Ehrlich (Stanford Univ.), while applauding the report's "sensible" conclusion that "family planning programs can improve lives in LDCs," claimed that it slights the importance of natural ecosystems, through which "all effects of population growth are mediated." The spokesman for the report's authoring committee, Samuel H. Preston (Univ. of Pennsylvania), argued that it is the market system which assigns value to resources such as land and water.

However, Preston agreed with Ronald Ridker's (World Bank) point that slower population growth would clearly benefit African countries like Zambia, where a 3.4 percent population growth is combined with a declining market for its one potential foreign-exchange-earning resource, copper.

Preston emphasized that the report itself calls for more of the country-specific research urged by the PAA panel, to put into context the report's conclusions, which session chairperson Timothy King (World Bank) characterized as somewhat "complacent" conclusions.

## Presidential Address

As in previous years, the Presidential Address was preceded by the annual awards ceremony. This year, the Dorothy S. Thomas award for the best paper by a graduate student on migration or demographic-social-economic interrelations was shared by Rachel Connelly (Bowdoin College) and Arline T. Geronimus (Harvard School of Public Health).

The biennial Mindel C. Sheps Award for excellence in mathematical demography was presented to John P. Bongaarts (Population Council), whose model of proximate determinants of fertility is famous.

In his presidential address, "Population and the Invisible Hand," PAA President Paul Demeny (Population Council) focused on an issue that has been at the core of the debate about whether population has good, bad, indifferent, or indeterminate effects on economic development: the extent to which society can entrust the solution of population problems to market forces.

To do so, he looked back over the history of economic and demographic thought to Adam Smith and Thomas Malthus. He recalled Adam Smith's "invisible hand," but then raised doubt about it as a painless mechanism for regulating population growth and its contribution to the common good. (He also cited Malthus's less known later writings to demonstrate how in ostensibly anti-Malthusian policy statements in Mexico City, U.S. Ambassador James Buckley was in effect echoing Malthus.)

"Preference for children over steaks in and by itself constitutes no population problem," Demeny said, using this example of how the invisible hand helps make economic choices. "A population problem exists when *my* preference for children diminishes *your* access to steak. ... We have a population problem, in other words, when externalities are attached to demographic behavior. That is a problem the invisible hand can solve only by accident."

Smith and Malthus—"those two great academic scribblers whose ghosts hovered over [Ambassador] Buckley in the conference hall in Mexico City"—lived at a time when the idea of too great a population was unheard of. Even Malthus's concern was over rapid population growth, not population levels per se. Consequently, they saw no reason to see beyond the invisible hand.

For the more developed countries, while the time has not now come, there is nonetheless "the possibility that fertility trends in the West will force a reexamination of existing public policies and their appropriate redesign in a pronatalist direction." "As yet, our profession has done little to take the measure of the disjunction between private interest and public good in low fertility societies and to explore possible approaches to structural-institutional reform that could provide a remedy to the problem"—a remark that also applies to the developing countries.

"The intellectual tradition" in population studies has been that population growth affects society one way or another, Demeny said. He criticized the recent National Academy of Sciences report as "pronouncing the near irrelevance of rapid population growth to anything really important in development and development policy." He felt that population growth does matter and that the rate of growth can be addressed in any given society's social covenant. Each society should clearly define what its rate should be and what arrangements it is willing to make to achieve its demographic goals.

*Continued on next page*

Coit Tower; Paul Demeny speaking on "The Invisible Hand"; Saturday's checkout line.

*Continued from preceding page*

## Themes

This year's PAA meeting echoed growing concern in the population field about low fertility in the more developed world as well as increasing skepticism over the negative consequences of rapid LDC population growth.

One example of this was the panel, chaired by Kingsley Davis (Hoover Inst. and Univ. of Southern California), entitled "The Prospect of Declining Population in the Western World." Panelist Michael S. Teitelbaum (Sloan Foundation) called for perspective on the population growth debate by pointing out that 20 years ago, when the "doomsdayers" were having their day, most demographers cautioned about their exaggerations. Today, as another breed of doomsdayers predicts the decline of the Western World, Teitelbaum expressed hope that once again reasonable demographers would warn about excesses.

The role of demographers in business was explored in sessions such as "Local Area Estimation and Forecasting," "Demography in Business," and "Demographic Dimensions of Market Research." In addition, one of the evening sessions gave graduate students (and others) the opportunity to explore "Demographic Careers in Non-demographic Settings."

Applied demographers were alarmed during the Business and State and Local Demographers' Breakfast by reports of PAA's acceptance of the American Sociological Association certification of demographers. There was a wall of opposition to certification. See next month's *PT* for more detailed coverage of this development.

## Sidebars

Marcus K. Felson (Univ. of Southern California) gave his role as chair of the session on the "Demography of Crime and Justice" a liveliness that future session chairs might emulate. All introductions and comments were presented in outrageous doggerel (e.g., "Discussants are like bumblebees/ They buzz the flowers and the trees/ They have some nectar, they have some stings/ But first of all, they'd better read the things").

The use of graphics in presentations is becoming an important force in making sessions more enjoyable than ever. A subjective choice for best use of graphics is John Long and Signe Wetrogan for their clear and uncomplicated three-dimensional image showing the interrelations and potential "new information" found in three existing sources of migration data. The same award for best overall delivery goes to Peter Morrison (Rand Corp.) for his informal, audience-oriented presentation (no reading, economical text, and graphic transparencies) on the implications of demographic change for the IRS. His performance was a role model for how to communicate relevant demographic information to a non-demographic audience.

Tim Schreiner of the *San Francisco Chronicle* hosted a party of *distingue* demographers, on a tour of San Francisco's demographically singular points of interest.

On Friday night, along with other parties such as Texas's and Penn's, PRB and Georgetown and Fordham Universities cosponsored a party notable (if a little editorializing may be permitted) for its civility and conviviality. Beverage connoisseurs who were there opined that Canfield's Diet Chocolate Fudge Soda may soon eclipse Lone Star Beer as PAA's leading party lubricant.

During this period also, a marathon "probability seminar" was in progress on the Sheraton Palace's fourth floor, a rapt seven-person audience in attendance. During repeated nighttime trials, the statistical chances of drawing to an inside straight were assessed in a hands-on context.

Nine participants in William Petersen's Friday luncheon roundtable discussion of "What Will Demography Be in 1996?" contributed their predictions (to be placed in a time capsule) as to which subfields of demography will dominate/fade away at the 1996 PAA meeting. The verdict: Applied demography up; theoretical demography down. Mortality and morbidity up—"much associated with the aging issue in industrial market economies"; fertility down. One conclusion: "Mortality will not die and most of us will be attending the session on personal financing."

Since its beginning at the Philadelphia PAA in 1979, the Fun Run has evolved into a traditional, noncompetitive morning jaunt. This year's Fun Run attracted some 27 early risers with a sex ratio of 800. The group, including an intrepid *PT* reporter, coursed from the Ferry Building toward Fisherman's Wharf and back, with the speeding PAAers cheered on by the passengers of the *QE2*, then docking in San Francisco harbor.

The fastest runners negotiated the less-than-four-mile route in about 23 minutes; others, including *PT*'s scribe, arrived "not too long" after.

Participants suggested that the PAA hierarchy take a greater interest in this session of the annual meeting. For example, it would be relatively easy to arrange a complimentary steak and eggs breakfast to reward the runners after their superhuman efforts.

The organizers of the PAA Fun Run consider the 1986 edition to have been a great success and invite all PAA runners and joggers to begin training now in preparation for the 1987 run in windy springtime Chicago.

*—compiled by Janine Adams, Lee Bouvier, Cary Davis, Bob Gardner, Art Haupt, Mary Kent, Denise Molajo, Tom Merrick, Joanne Scully, Jean van der Tak, and Nancy Yinger. Photo on page 3 by Linda Fay. Other PAA photos by Art Haupt.*

# World Bank's "Ultimate" Projections

The World Bank has issued its annual set of long-range population projections for the world's countries. This publication, prepared by Bank demographer My Thi Vu, is the only widely available set of projections for individual countries which show "ultimate" or "stationary" populations.

A stationary, or zero-growth, population is achieved after women in a country average two children each; at some point thereafter, the population will stop growing. In order to project a possible scenario for future population size, it is necessary to select an assumed schedule for fertility decline when the birth rate is high and a pace of fertility increase when the birth rate is low.

The Bank's projections serve as valuable country-level models showing future populations which result from one set of assumptions. In the case of Nigeria, for example, it is assumed that it would take 50 years for fertility to decrease from about 7 children per woman at present to 2. Following this schedule, Nigeria's population would rise from the present 100 million to over 500 million near the end of the next century, making it the third largest in the world, behind India and China. —*CH*

# New PRB Visiting Scholar Chosen

David E. C. Eversley has been chosen as the Andrew W. Mellon Foundation Visiting Scholar at the Population Reference Bureau, Inc.

A specialist in demography and social planning, Eversley was most recently president of the British Society for Population Studies (1981-1983).

His research has been concentrated on relating population trends to an analysis of British social policies. During his three-month study period at PRB beginning in September 1986, Eversley will study social indicators in the U.S. as they are used for policy purposes.

## SOFTWHERE

Did you ever want to know how many countries with dynastic governments export precious stones? The "One World Countries Database" allows you to have this type of information at your fingertips. The One World database contains up-to-date geographic, economic, and demographic facts for all the countries in the world. The user can display information for a single country or select information for analysis from the 33 available variables. The "USA Profile" contains selected information and statistical data on each state in the U.S. Demographic data include population size, urban population, age distribution, per capita income, unemployment, educational attainment and migration. Both programs are menu driven and user friendly. While designed for students in grades 5-12, the databases are also great timesavers for researchers who need databases with filing and searching capabilities.

Both packages contain operating instructions, teacher's notes, a wealth of student learning materials, and diskettes. Backup disks and multi-user "slave" disks are available. Packages exist for Apple IIe, IBM PC, Commodore 64 and BBC Acorn. Single disk drive. For more information write: Active Learning Systems, P.O. Box 1984, Midland, Mich. 48640 or call Mike Donner at 1-800-423-0818 —*KC*

## POPULATION UPDATE

### Estimated United States Population

| | |
|---|---|
| As of December 1, 1985 | 240,299,000 |
| As of December 1, 1984 | 238,044,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 981.

### Estimated World Population

| | |
|---|---|
| As of May 1986 | 4,928,000,000 |
| Annual Growth | 83,000,000 |

Estimated by extrapolation of the mid-1986 world population given on PRB's 1986 World Population Data Sheet.

### Latest Provisional Statistics for the U.S.: December 1985

| | 12 months-ending with December | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1985 | 1984 | 1985 | 1984 | 1983 | 1982 |
| Live births | 3,749,000 | 3,697,000 | 15.7 | 15.7 | 15.7 | 16.0 |
| Deaths | 2,084,000 | 2,047,000 | 8.7 | 8.7 | 8.6 | 8.6 |
| Natural increase | 1,665,000 | 1,650,000 | 7.0 | 7.0 | 6.9 | 7.4 |
| Marriages | 2,425,000 | 2,487,000 | 10.2 | 10.5 | 10.5 | 10.8 |
| Divorces | 1,187,000 | 1,155,000 | 5.0 | 4.9 | 5.0 | 5.1 |
| Infant deaths | 39,500 | 39,400 | 10.6 | 10.7 | 10.9 | 11.2 |
| Population base (in millions) | | | 238.3 | 235.8 | 233.7 | 231.5 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live-births. Rates are based on revised population estimates from the 1980 Census.

*Source. Monthly Vital Statistics Report* (Vol. 34, No. 12) from the National Center for Health Statistics.

# New Group Examines Immigration Research

Washington, DC., has become the home of another population-related nonprofit organization. The Center for Immigration Studies (CIS) was recently formed to carry out research on immigration trends and their effect on broad national economic and social goals.

The chair of the CIS board, Dr. Otis Graham, professor of history at the University of North Carolina, said that the Center will be "the nation's sole nonprofit research organization studying immigration from the broad national interest," as distinct from the short-term economic, ethnic or foreign policy interests which he says heretofore have characterized the national debate on immigration.

The Center will concentrate on three general areas: the broad consequences of immigration, the enforcement of immigration laws in ways consistent with democratic values, and the improvement of the quality and accessibility of immigration data. CIS will publish annotated bibliographies and study guides, review new immigration literature, and offer a reference and reprint service. The Center's director is Dave Simcox, a former State Dept. official and specialist in Latin American affairs.

"Illegal Immigration and the Colonization of the American Labor Market" is CIS' first publication. Written by University of California-Davis agricultural economist Philip Martin, the report documents the displacement of American workers by illegal immigrants in agriculture, food processing, services and construction, concluding that illegal immigration has contributed to distorted investment decisions, slower growth, and the proliferation of low-skill, low-productivity jobs in the American labor market.

Martin believes the country needs immigration reform. "The longer illegal immigration persists," he writes, "the more low wages will be incorporated into the values of business assets" and the longer labor-intensive forms of production will be profitable. —J.A.

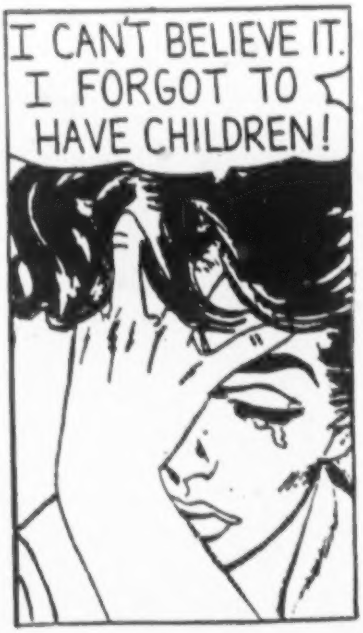
The paper may be obtained for $6.95 from the Center for Immigration Studies, 1424 16th Street, NW., Washington, DC 20036.

## TAKE A NUMBER

In response to many requests, PRB presents below its official estimated "clock" of population change for the world, more developed countries (MDCs), and less developed countries (LDCs).

| | | World | MDCs | LDCs | LDCs less China |
|---|---|---|---|---|---|
| Births per | YEAR | 135,762,245 | 17,942,560 | 117,819,685 | 99,444,685 |
| | MONTH | 11,313,520 | 1,495,213 | 9,818,307 | 8,287,057 |
| | WEEK | 2,610,812 | 345,049 | 2,265,763 | 1,912,398 |
| | DAY | 371,951 | 49,158 | 322,794 | 272,451 |
| | HOUR | 15,498 | 2,048 | 13,450 | 11,352 |
| | MINUTE | 258 | 34 | 224 | 189 |
| | SECOND | 4.3 | 0.6 | 3.7 | 3.2 |
| Deaths per | YEAR | 52,987,729 | 11,258,807 | 41,728,922 | 33,507,422 |
| | MONTH | 4,415,644 | 938,234 | 3,477,410 | 2,792,285 |
| | WEEK | 1,018,995 | 216,516 | 802,479 | 644,374 |
| | DAY | 145,172 | 30,846 | 114,326 | 91,801 |
| | HOUR | 6,049 | 1,285 | 4,764 | 3,825 |
| | MINUTE | 101 | 21 | 79 | 64 |
| | SECOND | 1.7 | 0.4 | 1.3 | 1.1 |
| Natural Increase per | YEAR | 82,774,516 | 6,683,753 | 76,090,763 | 65,937,263 |
| | MONTH | 6,897,876 | 556,979 | 6,340,897 | 5,494,772 |
| | WEEK | 1,591,818 | 128,534 | 1,463,284 | 1,268,024 |
| | DAY | 226,779 | 18,312 | 208,468 | 180,650 |
| | HOUR | 9,449 | 763 | 8,686 | 7,527 |
| | MINUTE | 157 | 13 | 145 | 125 |
| | SECOND | 2.6 | 0.2 | 2.4 | 2.1 |
| Infant Deaths per | YEAR | 11,106,485 | 313,678 | 10,792,807 | 9,874,057 |
| | MONTH | 925,540 | 26,140 | 899,401 | 822,838 |
| | WEEK | 213,586 | 6,032 | 207,554 | 189,886 |
| | DAY | 30,429 | 859 | 29,569 | 27,052 |
| | HOUR | 1,268 | 36 | 1,232 | 1,127 |
| | MINUTE | 21 | 1 | 21 | 19 |
| | SECOND | 0.4 | 0 | 0.3 | 0.3 |

## ADDENDA


I CAN'T BELIEVE IT. I FORGOT TO HAVE CHILDREN!

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# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

**WORLD RESOURCES 1986**, by The World Resources Institute and the International Institute for Environment and Development. New York: Basic Books, 1986. 353 pages. $32.95; $16.95 paper. ISBN 0-465-09234-9.

This is the inaugural volume of an annual series, and it is a gem. The report is divided into four parts: perspectives, world resources review, world resource issues, and world resource data tables. Information covered includes basic economic indicators, population and health, human settlements, land use and cover, food and agriculture, forest and range lands, wildlife resources, energy and minerals, freshwater, oceans and coasts, atmosphere and climate, and policies and institutions.

The chapter on population focuses on the basic components of growth – fertility and mortality – by providing a summary of trends and recent developments. This latter section profiles the 1984 International Population Conference in Mexico City, policy shifts in the U.S., and the slowdown in infant survival gains worldwide. There are three full-page inserts highlighting the historical background of Sweden's now almost negative growth rate, Kenya's rapid population growth, and the status of rural women in Bangladesh. Each year individual chapters will highlight different topics; for example, next year's chapter on population will focus on aspects of health and nutrition.

For reference librarians, the book provides a wealth of material, including cross-references, tables, and figures. However, the average reader may find it a bit difficult to scale the mountains of information the volume presents.

*– Denise Molajo*

**PROCEDURAL HISTORY OF THE 1940 CENSUS OF HOUSING AND POPULATION,** by Robert M. Jenkins. Madison, Wis.: Univ. of Wisconsin Press, 1985. 151 pages. $40.00. ISBN 0-299-10120-7.

The 1940 Census was a landmark enumeration in many ways. For one, it was the first U.S. census to feature a sample questionnaire in which 5 percent of the U.S. population was asked about such topics as place of birth of parents and number of children ever born. It was also the first census to ask questions on income. This was a controversial inclusion at the time, and was strongly opposed by Sen. Charles W. Tobey of New Hampshire; but relatively few people raised objections when the census was actually taken.

This book supplements the Census Bureau's *Procedural Histories* and completes the Bureau's earlier work on the 1940 Census history which was suspended during World War II. The book is a must for census buffs, filling a gap in the history of the modern U.S. Census (although its price may be a bit high for casual reading). The book contains 67 pages of text, with the balance devoted to appendices which contain reproductions of 1940 Census forms, instructions to coders, etc. The book was written to help document the project to create Public Use Samples for the 1940 and 1950 Censuses on computer tape; it will certainly be indispensable to any researcher who would use those tapes.

*– Carl Haub*

## Books Received

**AN ATLAS OF THE U.S. ECONOMIC GROWTH 1967-2000,** by NPA Data Services. Washington, DC: NPA Data Services, 1986. 247 pages. $65.00 ($55.00 prepaid).

**AGING IN MASS SOCIETY: Myths & Realities** (3rd ed.), by Jon Hendricks and C. Davis Hendricks. Boston: Little, Brown, 1986. 556 pages.

**THE HEALTH OF ADOLESCENTS AND YOUTH IN THE AMERICAS** (Scientific Publication No. 489), by Pan American Health Organization. Washington, DC: World Health Organization, 1985. 329 pages.$10.00.

**HEALTH UNITED STATES 1985**, by U.S. Dept. of Health and Human Services, Public Health Service. Hyattsville, Md.: HHS, National Center for Health Statistics, December 1985. 174 pages.

**THE HMONG IN TRANSITION**, edited by Glenn L. Hendricks, et al. New York: Center for Migration Studies of New York and the Southeastern Asian Refugee Studies Project of the Univ. of Minnesota, 1986. 464 pages.$17.50; $12.95 paper.

**IMMIGRATION STATISTICS: A STORY OF NEGLECT**, by Daniel B. Levine et al. Washington, DC: National Academy Press, 1985. 328 pages. $23.95 paper.

**IN AMERICA AND IN NEED: IMMIGRANT, REFUGEE, AND ENTRANT WOMEN**, by Abby Spero. Washington, DC: American Association of Community and Junior Colleges, January 1985. 175 pages.

**MATERNAL AND CHILD HEALTH DATA BOOK: The Health of America's Children**, by Dana Hughes et al. Washington, DC: Children's Defense Fund, 1986. 302 pages. $9.95.

**THE PILIPINOS IN AMERICA: Macro/Micro Dimensions of Immigration and Integration**, by Antonio J. A. Pido. New York: Center for Migration Studies, 1985. 151 pages.

**PROGRESS REPORT OF THE CENTER FOR POPULATION RESEARCH NATIONAL INSTITUTE OF CHILD HEALTH AND HUMAN DEVELOPMENT 1986,** by Center for Population Research, National Institute for Child Health and Human Development. Bethesda, Md.: U.S. Dept. of Health and Human Services, Public Health Service, National Institutes of Health, February 1986. 88 pages.

**REPORT OF THE SECRETARY'S TASK FORCE ON BLACK & MINORITY HEALTH** (8 vols.), by U.S. Dept. of Health and Human Services. Washington, DC: HHS/PS/Office of Minority Health. Free.

- Volume I: Executive Summary. August 1985. 239 pages.
- Volume II: Crosscutting Issues in Minority Health. (Forthcoming).
- Volume III: Cancer (Forthcoming).
- Volume IV: Cardiovascular and Cerebrovascular Diseases. January 1986. Part I, 226 pages. Part II, 586 pages.
- Volume V: Homicide, Suicide, and Unintentional Injuries. January 1986. 311 pages.
- Volume VI: Infant Mortality and Low Birthweight. January 1986. 190 pages.
- Volume VII: Chemical Dependency and Diabetes. January 1986. 374 pages.
- Volume VIII: Hispanic Health Issues (Forthcoming).

**THE STATE OF THE MASSES**, by Richard F. Hamilton and James D. Wright. New York: Aldine, 1986. 470 pages. $39.95; $18.95 paper.

**TUBERCULOSIS CONTROL; A MANUAL ON METHODS AND PROCEDURES FOR INTEGRATED PROGRAMS** (Scientific Publication No. 498), by Pan American Health Organization. Washington, DC: PAHO, 1986. 174 pages. $8.00.

**TROUBLE IN PARADISE: The Suburban Transformation in America**, by Mark Baldassare. New York: Columbia Univ. Press, 1986. 251 pages. $25.00.

# SPOTLIGHT

## BURKINA FASO

**Population (December 1985 census):** 7.9 million
**Land area:** 105,870 sq. miles
**Births per 1,000 pop. (1985):** 48
**Deaths per 1,000 pop. (1985):** 22
**Rate of natural increase (1985):** 2.6 percent
**Emigration rate (1985) :** 0.5 percent
**Percent urban (1985):** 9
**GNP per capita (1985):** US$180
**Capital:** Ouagadougou

by Nancy V. Yinger

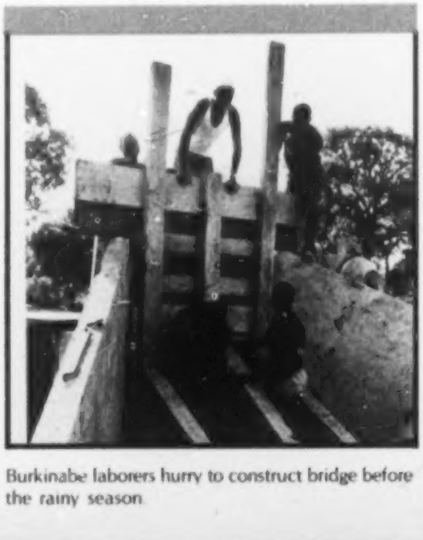
As one of the eight countries that make up the geographic region known as the Sahel, a semi-arid area just south of the Sahara desert, Burkina Faso (formerly Upper Volta) suffers from a poor resource endowment. Not only is the annual rainfall slight and variable – the area has experienced periodic drought for centuries, most recently in 1983-1984 – but also the soil is poor and known mineral deposits scarce. Despite the fragile and unpredictable nature of the environment, 80 to 90 percent of the Burkinabe make their living by traditional agriculture and/or livestock raising, accounting for the low per capita GNP.

Burkina has a varied ethnic composition. The main tribes are the Bobo in the southwest, the Mossi in the North, the Goruma in the East, and nomadic Fulani along the northern areas of the country bordering on Mali and Niger. Until the end of the 19th century the Mossi tribe ruled the area, centering its empire in Ouagadougou, the current capital. The French overthrew the Mossi in 1896. At the same time, Islamic expansion, which had been resisted by the Mossi, was more successful. Currently over half of Burkina's people practice native religions, with the rest divided between Islam and Christianity.

Since independence in 1960, political power has alternated between civilian and military governments. The current military regime, headed by Capt. Thomas Sankara, came to power in an August 1983 coup. The Sankara government is revolutionary in orientation, with links to the Soviet Union, Cuba and Libya. However, many other nations, including the U.S., contribute economic aid to the country's development efforts. Sankara changed the country's name from Upper Volta on the first anniversary of his takeover as a symbol of a new political order. Burkina Faso, roughly translated, means "Land of the Upright Men."

Among the Sahelian countries, Burkina is second only to Mali in overall populaaction size. It has a very high birth rate and a high, though declining, death rate. The 1975 census indicated a population of 5.6 million, and the rate of natural increase was estimated to be 2.6 percent. Thus the estimated population for 1985 was 7.1 million. However, the provisional results of the December 1985 census indicate a population of 7.9 million – a 3.4 percent annual rate of increase over the 1975 population. The discrepancy in the growth rate figures is thought to have resulted from a serious undercount in the 1975 census rather than a dramatic increase in the growth rate per se. In 1975, people refused to be counted, remembering the French colonial tax collectors. The government is currently reanalyzing the 1975 figures in order to get a better estimate of the actual intercensal growth rate.

The 1985 census was not without its share of controversy. There is a noticeable coincidence between the time of the census taking and the recent border skirmishes between Burkina Faso and Mali in an area which has been disputed by the two countries since the 1960s. In fact, both governments cited the census as the cause of the hostilities. Mali thought Burkina was claiming some Malian citizens and Burkina accused Mali of preventing the census takers from exercising Burkina's sovereign right. Although the war was short-lived, negotiations over the border continue.



James Pickerell for IDA

Burkinabe laborers hurry to construct bridge before the rainy season.

Another aspect of Burkina Faso's demographic situation is substantial outmigration of working-age males. The rate of population growth is reduced by up to half a percent per year as Burkinabe men go to the Ivory Coast and Senegal in search of work. The relative prosperity of those two countries combined with increasing pressure on Burkina's farmlands – current density is estimated to be 75 persons per sq. mile, more than four times the level in Mali and Niger – constitute a strong push factor. The migrants contribute significantly to the Burkinabe economy, up to 8 percent of GNP.

According to the World Bank, Burkina Faso is the world's sixth poorest country in terms of GNP per capita. It faces obstacles to development on all fronts: The literacy rate is only 11.4 percent for males and 3.6 percent for females; only 20.4 percent of the school-age population is enrolled in school; infant mortality is 180 deaths per 1,000 live births; and life expectancy at birth is estimated to be only 33 years in rural areas. Nonetheless, since independence the country has experienced economic growth, and GNP per capita has increased about 2 percent per year. If the good rains continue to fall, perhaps Burkina Faso can continue slow but steady development.

Nancy V. Yinger is Research Editor for PRB's IMPACT project.

# POPULATION TODAY

Vol. 14, No. 6 June 1986

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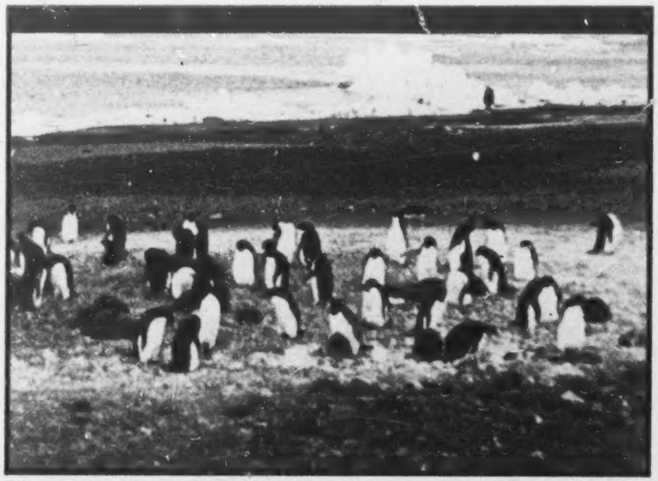

U.S. Navy photo by Howard Weinger

Either an *alfresco* black tie party, or a rookery of penguins in Antarctica. See page 12.

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# FROM THE EDITOR'S DESK

*"Lincoln, Neb., July 2.* Rutabaga processing is booming. For Gavin Elster, rutabaga processing manager, struggling to pay college bills for his sextuplets at the University of Virginia, this upsurge comes at a welcome ”

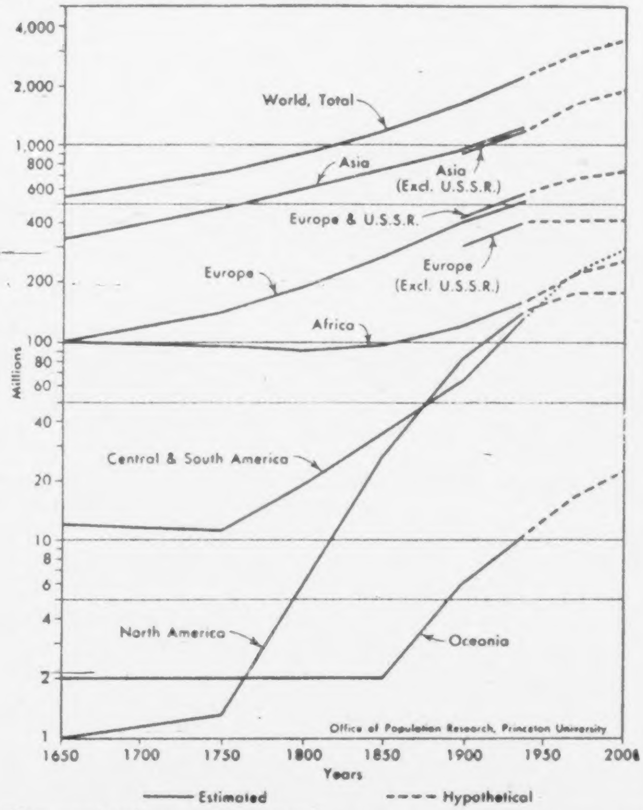
Human interest angle: Ever wonder how news stories can zoom from the general to the particular with the effortlessness of a Charles Dickens? Just how do giant media institutions *find* those perfect, one-in-a-million demographic personifications for their articles?

They manage it in many ways, from selective straw polls to exhaustive hunts via telephone. The most fruitful way, we're told, is to make contact via an intermediary institution; e.g., a determined quest for rutabaga statistics might lead to the National Rutabaga Institute, whose Deputy Director might already know a rutabaga processor with sextuplets, who, with such a suitable introduction, might be happy to get a load off his mind.

Therein lies the clincher. Just as people like to watch or read news with a personal touch, so, apparently, do they like to be in it – gabbing away for attribution on the most personal topics, with a nonchalance that astonishes even reporters.

*– Art Haupt*

# SPEAKING GRAPHICALLY



**Population projections of the past:** Before the magnitude of the post-World War II population explosion became evident, the conventional demographic wisdom was that future population increases would continue at about the rates of the past. Based on 1940s data, the above figure projects Africa to have a population of 200 to 300 million in 2000, while the world's population reaches between 3 and 4 billion.

This figure appeared in *Human Society* (1949) by Kingsley Davis. Later, Davis wrote extensively about the population explosion, as in his 1955 article, "The Population Specter: Rapidly Declining Death Rates in Densely Populated Countries," *American Economic Review*, 1956, 46(2), 305 ff.

# POPULATION TODAY

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# Do Demographers Need Credentials?

Whether demographers should be certified – a hypothetical question that had hung in the background for several years – came very much to the fore last month at the Population Association of America (PAA) meeting in San Francisco.

A session for applied demographers heard a report April 4 on the American Sociological Association's (ASA) just-implemented procedure for granting certification for various specialties of sociologists. Included in the ASA specialties: demography.

In what was described as a "stormy" session, many of the hundred or so applied demographers present questioned the need for such a credential. One result of the meeting: The committees of state and local demographers and of business demographers are drafting a position on ASA's new policy to be presented to PAA's Board of Directors later this summer.

## Why Certification?

For several years, sociologists have been considering whether there should be ASA certification in a variety of sociological specialties, for any qualified member who wished to apply. A number of factors prompted ASA's move. One was concern that professionals in the field not be underbid by less qualified practitioners "masquerading" as the real thing. Another was competition from disciplines that overlap sociology (e.g., psychology, social work), which had already begun their own credential programs.

In February 1985 ASA made the decision to go forward with certification; applications were accepted starting in early April 1986. The standards for applicants (who must be ASA members) are: a PhD, two years of postdoctorate experience, demonstrated professional competence, and three letters of recommendation. There is a $50 application fee, and certification is granted for a two-year period. The successful applicant earns the title of "sociologist certified in [specialty]."*

A similar program for those with master's degrees is set to follow in another year or two, and after three years ASA is to evaluate the entire idea.

> If some people are card-carrying demographers, then being a cardless demographer could lead to loss of credibility

ASA's original plan was to include demographers in the "medical sociology" category. But members of its certification committee argued successfully against the logic of that categorization. After discussion, demography was deemed a full specialty for credential purposes (and defined as the "social study of demographic processes").

## What about demographers?

How do demographers fit in with sociology? A proportion of sociologists are demographers. (ASA's section on population comprises about 350 members; the Association as a whole has about 12,000 members.)

The ASA plan was presented to PAA's Board at its November 1985 meeting. But the first public airing with grass-roots demographers was at the April 4 PAA session reported above. There, the audience, consisting mostly of applied demographers, expressed a number of objections. Many recoiled from the prospect of an outside organization giving a seal of approval to "demographers" (though ASA's language refers to "sociologists certified in . . ."). And only social demographers at that – despite the fact that demography progresses on many other, uncertified fronts, from economics to geography to historical research.

Further, the PhD requirement touched a nerve in the relatively rough-and-ready community of applied demographers. Many applied demographers came to demography from other fields, and do not hold PhDs. (Indeed, some of the "giants" of U.S. demography's formative years do not hold doctorates.) While the ASA program makes allowance for professional experience, making a PhD the norm was seen as overly restrictive.

Finally, one mandatory condition for ASA validation – that the applicant must be an ASA member – struck some in the audience as being unnecessarily limiting.

Beyond these concerns is the general apprehension of many demographers over the existence of any credentialing apparatus, whether or not they avail themselves of it. If some people are card-carrying demographers, then being a cardless demographer could lead to loss of credibility – and potential "economic

*Continued on page 9*

---

*The six ASA specialties are demography, law and social control, medical sociology, organizational analysis, social policy and evaluation research, and social psychology. They are not all-inclusive, and could change to fit demand.

# When High Schools Offer Family Planning

Center for Population Options

Today there are more than 40 clinics at U.S. schools that offer family planning services or referrals.

Growing concern over teenage pregnancy in the U.S. has sparked heated debate. Though there is a consensus that something must be done to reduce high levels of teen pregnancy, (about 1.1 million teens became pregnant in 1983) there are differing views on what should be done. One effort at addressing the needs of adolescents by providing family planning, counseling, prenatal care, as well as general health treatment, is the controversial school-based health clinic.

Today more than 40 of these clinics around the country (and others in the planning stages) give teenagers ready access to comprehensive health care. Though located on the school grounds, clinics are generally administered separately from schools by different kinds of organizations, ranging from hospitals and medical schools to family planning clinics.

The idea of these clinics has been around since 1970 when the first known clinic to provide both health and family planning services on a high school campus was opened in Dallas. Only in this decade, however, have large numbers of clinics been opened. The costs of the clinics, which are usually funded through a mixture of federal, state, and local public and private monies, vary greatly. In general, however, reasonably comprehensive care comes to about $100 to $125 per year per student user.

Most clinics are located in low-income areas, and many are in inner-city schools. As a result, these clinics are able to reach medically underserved teens. While the school-based clinics provide a wide array of health services for teens, ranging from athletic physicals and general health assessments to laboratory and diagnostic screening, each one is involved with family planning services as well. In many high schools, the reduction of teenage pregnancy is a priority item; thus the provision of family planning services and counseling, as well as gynecological care, is emphasized.

None of the clinics perform abortions, and few make abortion referrals. Most obtain written consent from the parents of each student before that student can receive medical services from the clinic.

The establishment of a school-based clinic is generally met with controversy. Opponents of the clinics worry that providing contraceptives in schools condones teenage sexual activity. Secretary of Education William Bennett has asserted that the clinics constitute an "abdication of moral authority," and asks "What lessons does it teach? What attitudes does it encourage?"

Proponents of the clinics often stress the benefits of inexpensive, *comprehensive* health care for teens who might not otherwise have access to medical care. In addition, proponents argue that teens will engage in sexual activity anyway, so providing contraceptives is the only way to stem the births of children to teenage parents. The debate can be boiled down to one of pragmatism in the face of rising teenage pregnancy rates vs., as *Washington Post* columnist William Raspberry put it, "an effort to hold fast to basic moral standards."

In any case, the crux of the debate is the clinic location. Clinic advocates see the school as the ideal place to reach teens, simply because they spend so much time there. Unlike Planned Parenthood clinics, teens using school-based clinics can seek care (either family planning-related or other) without embarrassment, because their peers need not know why they visit the clinic. Schools can also provide a unique opportunity to educate males about sexual responsibility.

Opponents of the clinics view the school as an inappropriate place for the provision of contraceptive services. Parents, not schools, should be responsible for providing teens with knowledge about contraception. More importantly, the home is where teens should be taught that sexual activity is inappropriate for young people. In Raspberry's words, "when it comes to sex, the only acceptable instruction the adults can offer to adolescents is: Don't."

Do school-based clinics indeed reduce teenage pregnancy? Not many clinics have been around long enough to draw definitive conclusions, but evidence from a St. Paul, Minn., clinic indicates that during the three years the clinic was open at Mechanic Arts High School, whose student population was 1,002, the known fertility rate dropped from 79 to 35 per 1,000 (a 56 percent decline), the dropout rate among girls who delivered and kept their children declined from 45 to 10 percent, and the use of contraception by those adolescent mothers doubled.

*–J.A.*

# SURVEY REPORT

## Kenya

Kenyan women still average about 8 children each. The average family size desired by ever-married women, however, dropped by one child, from 7.2 to 6.2, between 1978 and 1984, and the percentage of currently married women using contraception more than doubled, from 7 to 17 percent.

These are highlights of trends revealed by comparison of the just-released results of the Kenya Contraceptive Prevalence Survey of 1984 with the Kenya Fertility Survey of 1977/1978 that was part of the World Fertility Survey. The 1984 survey was conducted by Kenya's Central Bureau of Statistics as part of the USAID-supported Contraceptive Prevalence Survey program, with technical help from Westinghouse Health Systems.

The latest trends in Kenya's fertility and family planning can be expected to be of worldwide interest in view of the country's record-high population growth rate, currently put at 4.2 percent a year. Estimated at 21 million in 1986, the population of this Texas-sized country is projected by the United Nations to quadruple to 83 million by 2025 and could go as high as 116 million by 2100, according to the World Bank.

President Daniel arap Moi has often deplored the failure of the government family planning program – established in 1968 and the oldest in sub-Saharan Africa – to reduce fertility, despite his and other leaders' strong backing, large infusions of international aid, and a network of some 650 clinics offering free contraceptive services.

Among the reasons cited for the program's lack of success are bureaucratic snarls, shortages of supplies and trained personnel, along with short business hours and long waits in clinics that are not always easily accessible in rural areas. These problems are now being tackled with renewed vigor but there remains the obstacle of Kenyan couples' persistent, much-scrutinized desire for large families.

Over 80 percent of the 6,581 women aged 15-49 interviewed in the 1984 survey knew of at least one contraceptive method. The survey report calls the more than doubling of current contraceptive use between 1978 and 1984 "a significant success for the Kenyan family planning program." Even so, the 1984 level is "disappointingly low."

Also, the contraceptive mix shifted toward less effective methods. Among currently married women using contraception, the proportion using modern methods was down from 61 percent in 1978 to 52 percent in 1984, with pill use dropping from 29 to 19 percent of the total, while rhythm increased from 16 to 25 percent.

Fertility change was negligible: a slight increase in children ever born among women 45-49, from 7.9 to 8.2 per woman, along with a small decrease in the current total fertility rate from 7.9 to 7.7 per woman. Comparing the latter with the mean desired family size of 6.3 among all women in the 1984 survey, the report comments that "Kenyan women are currently giving birth to about one and a half children more than they desire."

Kenyan maternal and child health poster

This desire in turn is triple the average in low-fertility countries, such as Japan's 2.3 in 1984. "Therefore," the report says, "to ensure the success of the Kenyan family planning program, efforts should be increased to induce Kenyan families to reduce their desired family sizes."

One fruitful approach to this could lie in Kenya's continuing efforts to upgrade women's educational levels; between 1970 and 1980, primary school enrollment of girls jumped from 50 to 95 percent. The 1984 survey found that, like almost everywhere, family size desires and fertility are lower and contraceptive use higher among better educated women. For example, the proportion of married women currently using contraception was 36 percent among women with nine or more years of schooling (17 percent of the sample), compared to 19 percent for women with 5-8 years of education (32 percent of the sample) and just 12 percent for women with no formal schooling (35 percent of the sample).

The 1984 survey found scant support for the widespread claim that Kenyan men are the major obstacle to progress in lowering fertility. Of the reasons for nonuse of contraception given by women who knew of at least one method but were not using contraception and were not pregnant, husbands' disapproval accounted for only 9 percent, while the women's own disapproval accounted for 7 percent. Ranking higher were desire for pregnancy (15 percent), sexual inactivity or infertility (11 percent), not knowing how to use a method (11 percent), and women's perceptions that they did not get pregnant easily (10 percent). Only 4 percent of these women's reasons for not using contraception were not knowing where to go for services or finding it difficult to get them. – *J.v.T.*

# DEMOGRAPHER'S PAGE

## Racial Composition of Jurisdictions and the Election of Black Candidates

**By William O'Hare**

The extent to which blacks are elected primarily in black majority jurisdictions will have direct bearing on the likely growth of black elected officials in the near future, since the number of black majority jurisdictions is not likely to increase significantly in the next few years.

While most observers maintain that racial composition of a jurisdiction is extremely important for the election of black officials, casual observation provides mixed evidence. Many prominent black mayors come from jurisdictions where the majority of the population is black (for example, Coleman Young of Detroit, Marion Barry of Washington, D.C., and Andrew Young of Atlanta), but many others were elected in cities where blacks do not constitute a majority (for example, Thomas Bradley of Los Angeles, Harold Washington of Chicago, and Wilson Goode of Philadelphia).

### Black leader equals black majority?

The research presented here illuminates the role of racial composition in the election of black officials by examining municipalities where blacks have been elected mayor and a second set of jurisdictions where blacks constitute a majority of the population. The total population size and racial composition was recorded for each for the 278 municipalities that had a black mayor in 1985 and were incorporated in 1980, and the same demographic information obtained for the 526 incorporated places which had a black population majority in 1980.

One would expect a general association between the racial composition of a jurisdiction and the probability of electing a black mayor, and aggregate data support that prediction. Two-thirds (67 percent) of the 278 black mayors hail from jurisdictions with a black population majority.

Nonetheless, the association between racial composition and black electoral success is not as strong as some scholars suggest. Ninety-one of the 278 black mayors (33 percent) do not come from black majority places (see table at right), while 38 out of the 278 (14 percent) come from places where blacks constituted less than one-quarter of the population.

> Racial composition of a jurisdiction is an important determinant of black political success

Examination of black majority jurisdictions sheds additional light on the relationship between racial composition and election of a black mayor. Although most black mayors come from black majority places, most black majority places do not have black mayors; only 187 of the 526 black majority places had a black mayor, indicating that a black population majority by no means ensures the election of a black mayor.

Not surprisingly, the higher the black population majority, the higher the likelihood of having a black mayor. The vast majority (86 percent) of those places with a narrow black population majority (50 to 64 percent black) were without a black mayor. On the other hand, the vast majority (79 percent) of the jurisdictions where blacks made up at least 80 percent of the population had a black mayor (see table).

### North and South, Large and Small

National data mask significant regional variation in the relationship between racial composition and the probability of electing a black mayor. Election of a black mayor in the South is more heavily dependent on a black population majority than election of a black mayor elsewhere in the country. The average Southern municipality with a black mayor has a population that is 67 percent black, whereas outside the South the average black mayoral place was 55 percent black. Among the black mayors in the South, 74 percent were elected in jurisdictions where blacks made up more than half the population, while among the black mayors outside the South, only 52 percent came from black majority places (see table).

To gain a clearer picture of the role that racial composition plays in the election of a black mayor, black electoral success was examined in places of different population size. There are some reasons to believe that race may play a different role in the politics of small places than of big ones. In small places, where many Southern blacks live, elections often take on a much more personal tone, since the candidates may already be known to most of the voters. In big cities, home to more Northern and Western blacks, political organizations are likely to dominate. It would not be surprising if the race of a candidate had a more pronounced effect in the personal politics of a small town than in the "machine politics" of a large urban area.

While 4.4 percent of large places (over 25,000) have a black mayor, only about 1 percent of medium-sized and small places do. Furthermore, a black population majority is more easily translated into the election of a black mayor in large places than in small ones. Among the 33 places of 25,000 or more with a black population majority, 61 percent had a black mayor. On the other hand, only 36 percent

William O'Hare is Associate Director for Research at the Joint Center for Political Studies, Washington, D.C.

### Racial Composition, City Size, Regional Location, and Election of a Black Mayor

**Inside the South**

| | City Size A[*] | | City Size B | | City Size C | | Total | |
|---|---|---|---|---|---|---|---|---|
| Percent | Black Mayor? | | Black Mayor? | | Black Mayor? | | Black Mayor? | |
| Black | NO | YES | NO | YES | NO | YES | NO | YES |
| <50% | n/a | 21 | n/a | 22 | n/a | 6 | n/a | 49 |
| 50 to 64% | 156 | 20 | 74 | 6 | 8 | 5 | 238 | 31 |
| 65 to 79% | 49 | 29 | 11 | 5 | 0 | 4 | 60 | 38 |
| 80% or more | 21 | 63 | 0 | 9 | 0 | 0 | 21 | 72 |
| Total | 226 | 133 | 85 | 42 | 8 | 15 | 319 | 190 |

**Outside the South**

| | City Size A | | City Size B | | City Size C | | Total | |
|---|---|---|---|---|---|---|---|---|
| Percent | Black Mayor? | | Black Mayor? | | Black Mayor? | | Black Mayor? | |
| Black | NO | YES | NO | YES | NO | YES | NO | YES |
| <50% | n/a | 6 | n/a | 12 | n/a | 24 | n/a | 42 |
| 50 to 64% | 5 | 1 | 1 | 3 | 4 | 4 | 10 | 8 |
| 65 to 79% | 2 | 4 | 2 | 2 | 0 | 4 | 4 | 10 |
| 80% or more | 2 | 14 | 3 | 11 | 1 | 3 | 6 | 28 |
| Total | 9 | 25 | 6 | 28 | 5 | 35 | 20 | 88 |

[*] City Size A = <2,500 population
City Size B = 2,500 to 24,999 population
City Size C = 25,000 or more population

*Note.* Places with less than 50 percent black population and no black mayor were not included in the dataset.

*Source:* JCPS Analysis.

of the 366 black majority places of less than 2,500 had a black mayor. It is not clear whether this difference is due to population size per se, or because most small black majority places are in the South and race is a more salient characteristic in the South.

If population size alone has an impact on the likelihood of electing a black mayor, then we would expect black majority places of the same size to have about the same proportion of black mayors regardless of whether or not they are located in the South. We can test this expectation by looking at places of the same size inside and outside the South.

Among large places in the South that have a black population majority, 53 percent have a black mayor, compared to 69 percent outside the South. Among medium-sized and small places (those less than 25,000) with a black population majority, the difference between the South and the rest of the country is very evident. In the South, only 31 percent of small and medium-sized places have black mayors, compared to 70 percent in the North and West. (Medium-sized and small places are combined for this analysis because the number of black majority places under 2,500 outside the South is too small to provide meaningful statistics.)

It is clear that racial composition is more important inside than outside the South regardless of the population size of the place. At the same time, it is also clear that a black population majority can be translated more easily into a black mayorship in large places than in small ones regardless of the region where the place is located.

## One in three

Regional differences in the kinds of places that have black mayors also have another important ramification. Many analysts consider the black leadership factor to be critical to blacks' socioeconomic situation because black elected officials can offer direct benefits to their black constituents, such as equitable employment policies and increased sensitivity to black community needs, as well as indirect benefits including enhanced self-esteem and a reduced sense of political alienation. Consequently, it is important to know how many blacks live in jurisdictions with a black mayor and where they are located.

Our data indicate that 6.2 million blacks, nearly one out of every three who reside in an incorporated place, have a black mayor. This is striking since black mayors reside in only 278 cities. While there are only 88 black mayoral jurisdictions outside the South, their average size is 49,532 compared to an average size of only 9,523 for the 190 black mayoral places inside the South. Consequently, while 68 percent of places with black mayors are in the South, only 1.8 million Southern blacks live in places with a black mayor. On the other hand, only 32 percent of black mayoral places are outside the South, but they contain 4.4 million blacks. In short, about two-thirds of all black mayors come from the South, but three-quarters of all blacks who live in a place with a black mayor are in the North and West.

## Summary

The analysis indicates that racial composition of a jurisdiction is an important determinant of black political success, particularly in the South. About three-quarters of the black mayors in the South were elected in places with a black population majority, but almost half the black mayors outside the South were elected in places without a black population majority.

Many observers of black politics have noted the slowing rate at which blacks are being elected to office. Both the yearly percent increase and the absolute number have been declining. Some have speculated that the rate of increase may have fallen off due to the fact that blacks have now been elected in most of the black majority jurisdictions. While

*Continued on next page*

## Race and Elections

*Continued from preceding page*

this analysis cannot address all types of offices, it provides some clear indication that this theory does not apply to black mayors. There are twice as many black majority places without black mayors as there are with black mayors.

The analysis also indicates that there is ample opportunity for increasing the number of black mayors in the near future. Only about one-third of the 526 black majority places currently have a black mayor. Futhermore, given current trends in most large American cities, which show whites moving out more rapidly than blacks, there is every indication that the black share of the population in many major cities will continue to increase. Past demographic analysis by the Joint Center for Political Studies indicates that if the trends of the 1970s continue, the number of major black majority cities will climb to 32 in 1990 and 53 in the year 2000. Given the link between racial composition and the likelihood of electing a black mayor, these figures suggest that the number of black mayors in major cities will surely increase over the next few decades and the number of blacks living in black mayoral places will increase even more rapidly. ☐

## POSITIONS/ PROFESSIONALS

**Communications Director,** Zero Population Growth, Inc. (ZPG), to direct all communications activities. The Communications Director also serves as the editor of ZPG's national newspaper, the *ZPG Reporter*, and as the organization's staff editor.

Applicants must have several years of experience in media relations and publications production and must be crack writers and editors. Experience in and commitment to population-related issues is sought but not required.

Salary range: mid- to upper-twenties, depending on experience. Send cover letter, resume, and writing samples (no phone calls) to: Nancy Debevoise, ZPG, 1601 Connecticut Ave., NW, Washington, DC 20009.

# What's Your Handle?

If you've been busy "keeping up with the Joneses," we have some bad news for you. In the U.S., there are four last names more common than that moniker. By keeping up with the Joneses, one automatically falls behind about 10 million other Americans — the Smiths, Johnsons, Williamses, and Browns, to be exact.

This bit of trivia comes to us via the Social Security Administration's tabulation of the surnames of people who have ever enrolled in the system. The listing compiled the names (first six letters only) for appellations which occur at least 5,000 times.

What's the most common beginning letter for American names? It's "S", which, with 160,603 names, far outdistances Number 2, "B" (113,589). The letter "X" is dead last on the list with only one occurrence (Xiong), so if your name begins with that letter, you're in a rather select group.

The bottom five names on the list, ranking 8,410 through 8,414, are listed as Engleh(ard), Garwoo(d), Greeno(ld?), Kamp, and Vansan(t?). Where do some famous names reside on the list? Well, for one, Reagan comes in ranked 2,040th with 22,402 occurrences. And, if it seems as if there are quite a few Kennedys, that name is ranked high, 120th. Should the Hatfields and the McCoys (two famous feuding American families) ever decide to have it out once and for all, the Hatfields would be outnumbered about three to one. It might also be all over for the Capulets, who do not appear on the list, while names starting with "Montag" rank 2,048 (but "Montag" is also German for "Monday," so who knows how many Montagues there are).

Another list of names, first names in this instance, comes from the State of New York Dept. of Health. In 1985, Michael and Jennifer were the most popular names given in that state, as they had been for almost 15 years. In 1985, 42 percent of baby boys received names from the most popular 25, while 30 percent of the baby girls did. John and Mary? These "common" names are not so common. John dropped from 3rd place in 1975 to 7th in 1985 and Mary was not even in the top 25 in 1985. The top five boys' names in 1985 were Michael, Christopher, Matthew, Daniel, and Joseph, while for girls, they were Jennifer, Jessica, Christine(a), Nicole, and Amanda.

Besides being a bit of fun, name lists reflect the broad ethnic fabric of the country in an interesting way. The fact that Gonzalez ranks 24th on the list reflects a growing Hispanic heritage, and 23,806 last names starting with "Y" reflects, in part, Asian-Americans. In any event, the population of U.S. names has its own trends, its own dynamics. *—C.H.*

# Geographers Explore Twin Cities

The Association of American Geographers held their annual meeting in Minneapolis, May 3-7, and the 2,700 participants enjoyed a successful meeting. This may be one of the few groups which is *not* surprised to find that the Mississippi River runs between Minneapolis and St. Paul.

The Census Bureau was well represented, participating in sessions on 1990 Census products, Census geography, urbanization, housing, and others. PRB staffers Kim Crews and Carl Haub ran the PRB booth in the exhibit hall and gave session presentations.

Once again, the common interests of geographers and demographers were evident in such topics as migration, population distribution, fertility, ethnicity, and aging. But the variety of geographic subject matter covered suggests an even broader spectrum of possible joint study, including the population impact of weather patterns, the location of energy resources, soil erosion, and the effect of tourist areas on coastal zones.

Activities at the meeting were continuous, with sessions and business meetings scheduled into the evening hours (although several members found time to watch the Twins drop a game to the Baltimore Orioles at nearby Humphrey Metrodome). *—C.H.*

## Certification

*Continued from page 3*

loss," in the words of one participant. For example, demographers testifying in court as expert witnesses could be vulnerable to credibility questions from opposing counsel such as: "Are you, Mr. Jones, in fact an ASA-certified demographer?"

### The Future

Backers of ASA certification were surprised by the applied demogrraphers' reaction, and reiterated that ASA was not trying to intrude on PAA's turf or pigeonhole the demographic profession. When ASA holds its 1986 meeting in August, the various certification committees will consider the applications so far received. In the future the categories and indeed the existence of certification could change, if circumstances require.

PAA has not been idle on the subject of certification. When the issue was raised at the November 1985 Board meeting, the Board appointed a committee to explore the possibility of PAA setting its own professional standards. That Committee, chaired by Jane Menken, plans to submit its report to the Board later this year.

At present, *PT* gathers, there is no leaning on the Board for or against official demographic credentials, though the feeling is that if demographers are to be certified, it should be done by PAA and not an outside organization. But at this time, there is no perceptible movement to get PAA into the certification business, either in self-defense or on certification's own merits.

That certification has arisen as an issue is at least an acknowledgment of the growing PAA subpopulation of applied demographers. Academicians have their own ways of setting professional standards (degrees, professorial ranks, etc.). But applied demographers work in a fairly unstructured world. Until they feel the need for, and support, the principle of certification, the watchword will remain: Demographers are where you find them.

*—A.H.*

## Correction

Our misreading of the French text caused an error in the Survey Report on Morocco (March 1986 *PT*). The 40 and 5 percent figures cited are for ever use of contraception. Current use at the time of the survey was 26 percent.

## SOFTWHERE

The RAPID (Resources for the Awareness of Population Impacts on Development) Demographic Analysis System is a set of four programs for the IBM PC, each dealing with a different aspect of population: demographic projection, determining costs of family planning programs, a TARGET model, and education planning.

Developed by the Futures Group, the projection program is especially easy to use in projecting population totals. The only inputs required to run the program are base population, fertility and mortality rates, life expectancy, age distribution of fertility, and migration. All can be easily varied. At present, the program does not accept life expectancies above age 75, which is adequate for less developed country projections, but makes projections for more developed countries more difficult.

The output is provided in the form of tables which examine the total population, divided into 5-year age groups, age and sex distribution, population by single ages or single years, and demographic indicators.

The program set (and companion disks for the latter three programs) can be obtained at no charge. For more information, contact the Futures Group, 1111 14th St. N.W., Washington, D.C. 20005. *—W.P.*

## POPULATION UPDATE

### Estimated United States Population

| | |
|---|---|
| As of January 1, 1986 | 240,468,000 |
| As of January 1, 1985 | 238,222,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, *Current Population Reports*, Series P-25, No. 983.

### Estimated World Population

| | |
|---|---|
| As of June 1986 | 4,935,000,000 |
| Annual Growth | 83,000,000 |

Estimated by extrapolation of the mid-1986 world population given on PRB's 1986 World Population Data Sheet.

### Latest Provisional Statistics for the U.S.: January 1986

| | 12 months ending with January | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1986 | 1985 | 1986 | 1985 | 1984 | 1983 |
| Live births | 3,753,000 | 3,696,000 | 15.7 | 15.6 | 15.5 | 16.0 |
| Deaths | 2,083,000 | 2,055,000 | 8.7 | 8.7 | 8.6 | 8.6 |
| Natural increase | 1,670,000 | 1,641,000 | 7.0 | 6.9 | 6.9 | 7.4 |
| Marriages | 2,428,000 | 2,480,000 | 10.2 | 10.5 | 10.4 | 10.8 |
| Divorces | 1,188,000 | 1,157,000 | 5.0 | 4.9 | 5.0 | 5.1 |
| Infant deaths | 39,400 | 39,300 | 10.5 | 10.7 | 10.9 | 11.3 |
| Population base (in millions) | | | 238.5 | 236.3 | 233.9 | 231.7 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

*Source. Monthly Vital Statistics Report* (Vol. 35, No. 1) from the National Center for Health Statistics.

# LETTERS TO THE EDITOR

In response to your survey of data sheet users concerning what to do about the year 2000 [March 1986 *PT*] ... one problem with the current data sheet projections, in my view, is that there is too big a gap in the projected years. Don't a lot of users want to know population in, say, 25 years or 50 years? Right now, as I read the sheet for 1986, I know today's population, that projected for 14 years from today, and that projected for 114 years from today.

If I were in your shoes, I'd consider making projections for 25 years, 50 years, and 100 years. Each year then, the projected years would advance one year. If you did this, at least whoever is editing *PT* 100 years from now won't have to worry about what to do about the year 3000.

*– Bryant Robey*
*Director, Public Affairs*
*East-West Center*

Decades into the new century (2001, 2011, 2021) would be awkward numbers for the public to cope with, but the 21st Century does actually begin in the year 2001 (as the 1st Century began in the Year 1).

For museum purposes, *five-year* projections would be useful – especially for age groups. This response may not be useful to you, but ...

*– Edward Pearce, Librarian*
*Boston's Museum of Science*

As to the year 2000, I've been in a funk since we passed 1984. Nothing has a nice ring to it. 2020 is fun to type and has that necessary link to TV shows, always essential when you try to communicate with American couch potatoes, don'cha know. Keep up the strange and wonderful work.

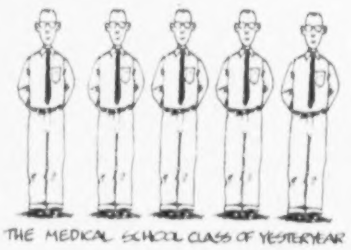
*– Nancy Debevoise*
*Communications Director*
*Zero Population Growth*

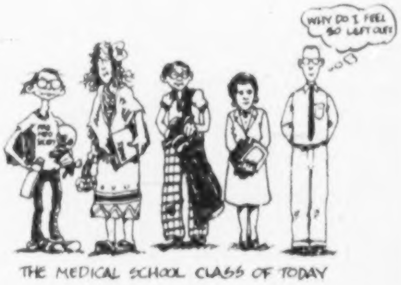
# TAKE A NUMBER

**Demographic Drift:** While we weren't looking, the population center of the U.S. moved south and westward once more. Sometime in the late 1970s, it crossed the Mississippi River into Missouri, on its way West. The geographic center of population (demography's answer to plate tectonics) is the spot where the country would balance if it were a flat plane and we all weighed the same. It is now estimated to be in west-central Washington County, Mo., not far from the Mark Twain National Forest, about 10 miles northwest of Potosi. The exact center of population cannot, of course, be located until the next full census is taken in 1990.

**New Labor Force Projections:** The International Labour Office (ILO) of the UN has released its most recent series of projections of labor force for the world, regions and countries. These projections replace the last ILO series, published in 1977. The data given in the report provide a consistent series across countries and regions based upon uniform concepts of "labor force." This concept is based on ILO recommendations for a standard international definition and covers employed and unemployed persons (those seeking work); included are employers and employees, the self-employed, unpaid family workers, members of producers' cooperatives, and members of the armed forces. The estimates and projections are for the period 1950 – 2025 and are presented in six volumes for the world and separate regions, with the sixth being the Methodological Summary. Overall, the projections suggest a slowly increasing labor force in the more developed countries, although virtually all of that is in North America and the USSR; in Europe, slow decline in the size of the labor force is projected by 2025. In the less developed countries (LDCs), considerable increase is projected, a consequence of population growth in those regions. The labor force in LDCs is projected to nearly double from 1985 to 2025, from 1.6 billion to 3.0 billion. Further information on the projections series can be obtained from the ILO, Bureau of Statistics, CH-1211, Geneva 22, Switzerland. – *CH*

# ADDENDA


THE MEDICAL SCHOOL CLASS OF YESTERYEAR


WHY DO I FEEL SO LEFT OUT
THE MEDICAL SCHOOL CLASS OF TODAY

Prior to 1968, women enrollees made up less than 10 percent of classes entering medical school. In 1984, this figure had reached 34 percent.

Drawing from *The Official M.D. Handbook* by Anne Eva Ricks, M.D. Copyright © 1983 by Anne Eva Ricks. Artwork copyright © 1983 by Jon McIntosh. Reprinted by arrangement with New American Library, New York, NY.

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th·St., N.W., Washington, D.C. 20005.*

This month's column highlights materials recently received by the library on the topic of health. All four reports covered are paperback editions and nominally priced.

### REPORT OF THE SECRETARY'S TASK FORCE ON BLACK AND MINORITY HEALTH

**REPORT OF THE SECRETARY'S TASK FORCE ON BLACK AND MINORITY HEALTH** (8 volumes), by the U.S. Department of Health and Human Services. Washington, D.C.: HHS/PS/Office of Minority Health. Available through the Government Printing Office.

The Task Force on Black and Minority Health was established in April 1984 in response to the concern that, though health in the U.S. as a whole has improved, there still exist persistent, significant health inequities for minority Americans.

The first volume of the Task Force Report summarizes information and data compiled on specific minority health problems, and recommendations for addressing the disparity in health status between minority and nonminority populations. Subsequent volumes of the report contain the complete text prepared by the subcommittees supporting their findings, and proposed intervention strategies, along with the complete inventory of DHHS programs and projects that benefit minorities, and an annotated bibliography listing selected topics related to Hispanic health issues.

(See the May 1986 *PT* for a listing all titles within the Task Force Report. Please note that complimentary copies are no longer available.)

### HEALTH OF ADOLESCENTS AND YOUTHS IN THE AMERICAS,

by The Pan American Health Organization. Washington, D.C.: World Health Organization, 1985. 329 pages. $10.00. ISBN 92-75-11489-7.

Adolescents receive well-deserved attention in this book, published in 1985, International Youth Year. The first part presents this age group's demographic, social, and epidemiological conditions (the top three being accidents for both sexes, homicides or suicides for males, and heart disease or complications of pregnancy for females).

Part Two addresses aspects of normal adolescence, stressing human physical and psychological growth and development at this stage of life. The third part describes frequently encountered problems (physical and behavioral) of the age group, while the fourth part deals with the problems of pregnant adolescents.

The fifth and final section treats various programs and services for adolescents in different countries of the region.

### MATERNAL AND CHILD HEALTH DATA BOOK: THE HEALTH OF AMERICA'S CHILDREN,

by Dana Hughes et al. Washington, D.C.: Children's Defense Fund, 1986. 302 pages. $9.95. ISBN 938008-49-8.

This book describes the status of maternal and child health in America, and the nation's progress in reducing infant mortality and improving health care for pregnant women. It also covers state-by-state patterns of teenage and out-of-wedlock childbearing.

Much of the raw data are from the National Center for Health Statistics with calculations by the Children's Defense Fund. The report presents extensive information on a state-by-state basis (1983 data) on maternal and infant vital statistics, the success of state AFDC, Medicaid, and WIC policies, and an assessment of each state's rate of progress toward meeting the Surgeon General's 1990 Objectives for the Nation on maternal and child health.

### HEALTH, UNITED STATES, 1985,

by the National Center for Health Statistics. Hyattsville, Md.: DHHS, December 1985. 174 pages. $6.50. Pub. No. (PHS) 86-1232. Available through the Government Printing Office.

This annual provides 21 charts with text on health status and health care utilization within the United States. Subjects covered include mortality, natality, heart disease risk factors, and operations and procedures. It also provides 101 detailed tables on four major health areas – health status and determinants, utilization of health resources, health care resources, and health care expenditures. The tables are designed to show continuing trends over a period of years; hence, the tables in each edition cover the same topics to enhance the use of this publication as a reference source.

*– Denise Molajo*

## Books Received

**AMERICA'S OLDER POPULATION**, by Paul E. Zopf, Jr. Houston, Tex.: Cap and Gown Press, 1986. 325 pages. $32.95.

**THE BIRTH CONTROL BOOK**, by Philip A. Belcastro. Boston, Mass.: Jones and Bartlett, 1986. 132 pages. $8.75.

**IMPROVING CIVIL REGISTRATION**, edited by Forrest E. Linder and Iwao M. Moriyama. Bethesda, Md.: International Institute for Vital Registration and Statistics, N.D. 242 pages.

**OUR AGING SOCIETY:** Paradox and Promise, edited by Alan Pifer and Lydia Bronte. New York: Norton. 1986. 438 pages. $22.95.

**POPULATION GROWTH AND POLICIES IN MEGA-CITIES: Calcutta** (Population Policy Paper No. 1, ST/ESA/SER.R/61), by the Department of International Economic and Social Affairs, United Nations. New York: United Nations, 1986.

**QUALITY OF LIFE IN AMERICAN NEIGHBORHOODS: Levels of Affluence, Toxic Waste, and Cancer Mortality in Residential Zip Code Areas**, by Jay M. Gould and edited by Alice Tepper Marlin. Boulder, Colo: Westview Press, 1986. 402 pages. $46.95.

**SCHOOL-AGE PREGNANCY & PARENTHOOD: Biosocial Dimensions,** edited by Jane B. Lancaster and Beatrix A. Hamburg. New York: Aldine, 1986. 403 pages. $39.95.

# SPOTLIGHT

## ANTARCTICA

**Population (1986 est.): 3,000 in summer; 1,000 in winter**
**Native-born population: 1**
**Penguin population (1985 est.): 75 million**
**Land area: 5,000,000 to 6,000,000 sq. miles (10 percent of the world's land area)**

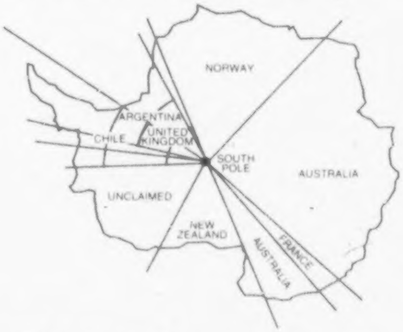
### by Janine Adams

A high, deep, round island half again as big as the United States, Antarctica is 98 percent covered with ice. Underneath this ice cap, Antarctica's land area consists of an archipelago to the west, along with the large, old and very stable slab of rock that is eastern Antarctica. Despite the immense accumulation of compressed snow (which holds about 75 percent of the earth's fresh water), there is little precipitation – the South Pole's annual precipitation of 3 cm is roughly that of the driest part of the Sahara.

While in 1978 a baby boy was born on the continent to the wife of an Argentine scientist, Antarctica has no indigenous population. It does have temporary occupants – researchers who work at approximately three dozen scientific stations set up by 18 different countries, studying the continent's weather, ice shelves, geologic formations, and marine life (such as those pictured on page 1).

During Antarctica's winter (mid-March to mid-September), the 1,000 inhabitants, though they can view the shimmering *aurora australis*, rarely see the light of day. During the rest of the year, Antarctica's summer population of 3,000 glimpses very little darkness.

The Antarctic continent was first discovered in the 1820s. At the beginning of this century, various nations began laying claim to slices of the pie. Today, seven different nations (Norway, Australia, France, New Zealand, Argentina, Chile, and the United Kingdom) have staked claims to Antarctica, though the claims of Argentina and Chile overlap with that of the U.K. (see map). The U.S., USSR, and other countries have refused to recognize these claims or stake their own. In 1959, the seven "claimants" and five "non-claimants" signed the Antarctica Treaty, freezing territorial claims in the name of scientific research. The treaty stipulates that "Antarctica shall continue forever to be used exclusively for peaceful purposes." Since 1959, the governments of some developing countries have expressed interest in Antarctica coming under international control, rejecting the present system as colonialist. This undoubtedly will be a topic of consideration after 1991, when any of the treaty's consulting nations may request a review of its operation.



Antarctica is of interest to the international community for its untapped resources, such as petroleum, minerals, and even water. The costs of mining any of these resources would be prohibitive in this distant and desolate land where 90 cents of every dollar spent there goes for logistics. Only if there is a global oil shortage far more severe than any yet experienced would governments spend the kind of money necessary to extract oil in Antarctica. New technologies, such as submarine storage tanks, would have to be developed for such extraction to occur.

The possibility of exploitation of hard minerals is even more remote; in today's market, each dollar's worth of refined metal would cost $10 to extract. Icebergs as a source of water for parched lands in western Australia or Chile have proven unfeasible. A Saudi prince once spent millions of dollars devising a way to tow an iceberg northward, but it became apparent that the only thing he would end up with was an empty tow rope.

Krill, the small, shrimplike crustaceans which swim in dense swarms, are the source of food for Antarctic life. Rich in protein and minerals, krill have been viewed as a potential food source for the growing human population worldwide. Scientists warn, however, that krill fishing poses serious threats to the Antarctic marine ecosystem, since krill support all the higher species in the marine food chain. They are the major food source for five whale species, three species of seal, 23 species of fish and squid, as well as many birds.

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# POPULATION TODAY

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CONFERENCE ON POPULATION
AND DEVELOPMENT
12th-16th MAY 1986
HARARE
CONFERENCE SUR LA POPULATION
ET LE DEVELOPPEMENT

Elaine M. Murphy

African leaders met in Harare, and PRB was there. See page 3.

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# FROM THE EDITOR'S DESK

We're told on good authority that:

*At a major science museum in the Northeast, there's a population clock on display. Schoolkids, needless to say, are fascinated. Clearly they (the kids) believe the numbers. Moreover, they actually believe that there is a direct correspondence between actual births and deaths and the clock's blinking lights. Perhaps a connecting wire?*

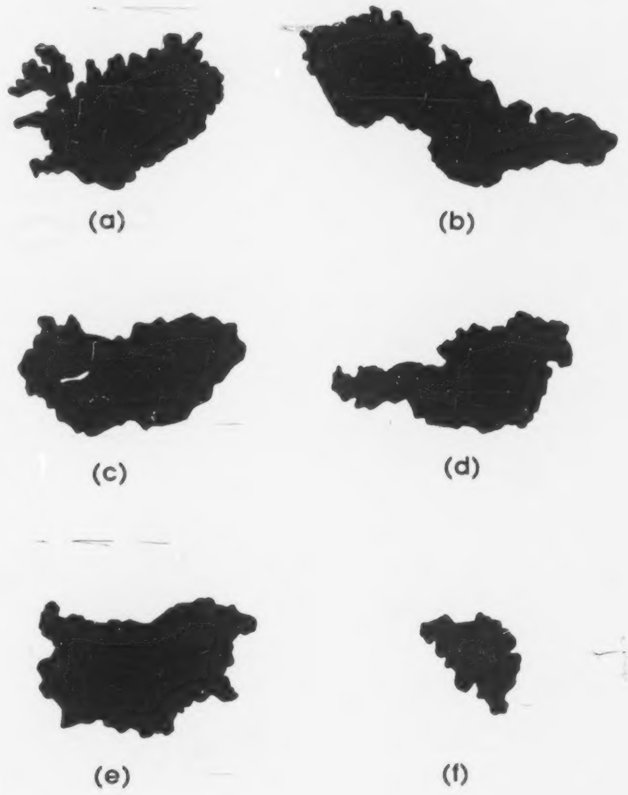
When you grow up, however, you'll learn the great lesson of science; that there is no magic connection between your models and awesome Reality. There are only your elders, humbly and responsibly measuring the world and trying (with brave model after model) to infer the invisible order behind the welter of visible data.

*In addition, the museum being of the touchy-feely variety, the schoolkids apparently consider the population clock as one more mechanical exhibit with pushbuttons. And they have often been observed repeatedly pressing and punching the "death" light (which looks like a button), undeterred by apparent lack of results.*

Now cut that out!

*—Art Haupt*

# SPEAKING GRAPHICALLY



**Rorschach countries:** Every country has its own unique shape, but some national profiles are a bit less distinctive than, say, Italy, Australia, or Texas. Can you name the six nations silhouetted above? (Answers on page p. 9.)

POPULATION TODAY

**VOL. 14, NO. 7/8 July/August 1986**

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# African Policymakers Discuss Population

A conference with impact. That's what the organizers of the All-Africa Parliamentary Conference on Population and Development hoped to deliver to some 150 African lawmakers from 39 African countries who came to Harare, Zimbabwe, May 12-16, to swap information and ideas.

Billed as a "historic breakthrough on the problems of Africa," and organized by the Global Committee of Parliamentarians on Population and Development, the conference brought together country leaders from all over the continent, many of whom gained new insights into the population and development efforts of neighboring countries.

In the end, their goal was achieved: Conference participants adopted a declaration recognizing the role of population in development, and the need for efforts to be made on the part of the government to improve the quality of life of the populace. The policymakers emphasized the need for improved health care, new family planning research and services, realistic migration policies, improved status of women, and self-sufficiency in food production for the continent as a whole. Furthermore, the parliamentarians resolved to institute a permanent Council of African Parliamentarians on Population and Development to continue national, continental, and global support for these issues and to monitor implementation of the declarations adopted at the conference.

The conference was populated by VIPs, such as Honorable Comrade Robert Mugabe, prime minister of Zimbabwe, and James Grant, head of UNICEF, pictured at right with PRB vice president Leon Bouvier, and received extensive coverage in *The Herald* of Harare and newspapers throughout the continent.

## RAPIDly progressing

In conjunction with the official conference, the RAPID II (Resources for the Awareness of Population Impacts on Development II) team organized population policy workshops for a specially invited group of 25 African policymakers from 15 countries. Since 1983, RAPID II has been contributing to the discussion of the relationship between population and development, and to the systematic formation of national population policies throughout the world. Using microcomputers, RAPID II team members graphically illustrate population and development relationships to ranking members of governments throughout the developing world. RAPID II also funds population research done by developing country nationals and provides direct assistance to seminars on population issues and policies, such as the workshops in Harare.

> In Africa, leaders are more willing than ever before to consider fertility-reduction policies

PRB's profit-making subsidiary, the Demographic Information Service Center (DISC), holds a subcontract with the Futures Group for the RAPID II project. DISC's team of three (led by Tom Goliber, with Pietronella van den Oever and Leon Bouvier), has worked extensively throughout the sub-Saharan region. In addition to organizing the policy workshops, the DISC/RAPID II team offered logistical support for the official conference.

In Africa, the general sentiment about population policies has been changing over the past few years: National leaders are more willing than ever before to consider fertility-reduction policies. In response to this trend, RAPID sponsored the workshops to give the participants, many of whom work for organizations responsible for population activities in their home countries, an open forum to exchange ideas and discuss policies and strategies. Such policy-oriented discussion did not take place in the official conference. In addition to attending the workshop, all the RAPID participants were involved with the official conference, mostly in the capacity of observers and rapporteurs.

## PRB's IMPACT

PRB made another important contribution to the Harare conference and policy workshops, in the form of a colorful poster and three publications on African population trends designed specifically for the conference. The publications were commissioned by RAPID and produced by another PRB project: IMPACT (Innovative Materials for Population Action). These handsomely designed booklets provided the policymakers a clear and understandable picture of African population trends, contraceptive prevalence, and family planning program options.

*Continued on page 9*

Some illustrious conference participants (from left): James Grant, Honorable Comrade Robert Mugabe, unidentified man, Leon Bouvier.

# 'Population Pressures' to Migrate North

In 1950 Latin America's population of 165 million was on a par with the 166 million population of North America (the U.S. and Canada). But by 1985 it was 1.5 times larger – 405 million versus 264 million – and by 2025, according to United Nations medium projections, it could be over twice as large as North America's population – 779 million versus 345 million.

In PRB's *Bulletin* for July, "Population Pressures in Latin America," economist-demographer and PRB president Thomas W. Merrick points out that this population surge, coupled with economic downturns of the 1980s, adds up to tremendous problems for the diverse countries south of the Rio Grande that range from vast and populous Brazil down to the tiny island nations of the Caribbean. And because of the close geographic, economic, and social ties that bind the two regions, these problems are bound to mean ever-larger flows of migrants into the better-off countries of North America.

Latin America's post-1950 population expansion began with two decades of growth at nearly 3 percent a year, as mortality declined and fertility stayed at a high 6 to 7 births per woman. Though fertility has dropped substantially since the 1960s, the rates in most countries are still well above the "replacement" level of 2 births per woman, Merrick notes. Also, because of past high fertility and decreasing mortality, population age pyramids are bottom-heavy with extra-large proportions of young people. This ensures continuing increases in annual births, despite declining fertility rates per woman, and also extra pressures on job markets.

These pressures have weighed heaviest on the region's cities, Merrick says. Extreme land-tenure inequality and the urban bias of post-World War II industrialization policies have meant that rural areas could absorb little of the population increase and the result has been massive rural-to-urban migration. Because of the capital intensiveness of postwar industrialization, growing city populations have had to turn to services to find employment, mostly self-created jobs in the informal sector. The pressures on city services and housing as well as job markets have been compounded by economic downturns of the 1980s and the overconcentration of urban population in a few large cities. Mexico City, Sao Paulo, Buenos Aires, and Rio de Janeiro, for example, currently rank No. 1, 3, 7, and 8 in the lineup of the world's largest metropolises and by 2000 the region is expected to have more than 50 cities with populations of over a million.

WHO/UNICEF photo by H. Cerni

Drawing water in a Colombian squatter settlement.

The search for jobs coupled with political turmoil in Central America has led to large flows of international migration from poorer to better-off countries within the region and increasingly northward into the U.S. and Canada, Merrick observes.

Some Latin Americans have argued that long-standing income and political inequality rather than rapid population growth hinders the region's economic development. But a new view sees both as obstacles, Merrick says. In Merrick's opinion, recent fertility declines have resulted from the joint effects of increased access to family planning – 19 of the countries now support family planning programs – and "the economic and social pressures posed by the gap between young adults' aspirations and their ability to realize them."

In the long run, demographic and economic pressures could slow Latin America's population growth "faster than anyone has imagined," he suggests. But in the meantime, the region and its neighbors to the north will feel the certain consequences of its rapid population growth of the past few decades. The number of young adults in the labor force entry-level ages of 15 to 24 will grow by 22 million between 1985 and 2000, with over 8 million of this increase coming in Mexico and the six Central American countries closest to the U.S. With the debt crisis and inflation cutting back living standards and Latin America's supply of productive jobs even further, this "points to even larger flows of international migration within the hemisphere, particularly to the U.S.," Merrick warns. *– I.v.T.*

Copies of the 51-page *Population Bulletin*, "Population Pressures in Latin America" (Vol. 41, No. 3), can be ordered for $4.00 each; 2-10 copies, $3.00 each; 11-50 copies, $2.50 each; over 50, $2.00 each. For order information, see page 10.

# Anti-Asian Violence Pattern Probed

A pattern of "activity [against Asian Americans] in the form of violence, vandalism, harassment, and intimidation continues to occur across the Nation," the U.S. Civil Rights Commission says in a new draft report. "Incidents were reported in every jurisdiction visited by Commission staff and in other parts of the country as well."

Violence against minorities has an unfortunate history in the U.S., but Asian-directed violence has not been studied until recently. It ranges in seriousness from anti-Asian bumper stickers to assault and homicide. Its victims include such diverse groups as Hmong tribespeople, Korean shopkeepers, and Vietnamese fishermen.

"No single factor has produced current anti-Asian behavior. Rather it appears to be a combination of many factors of which race is one," says the Commission in its draft report. Among other things, the report reveals economic resentment of, and also profound ignorance about, Asian Americans; for example, the shocking 1982 murder of Vincent Chin in Detroit. Chin, a Chinese American, was fatally beaten in a parking lot by two unemployed auto workers, reportedly because they thought he was Japanese and they were expressing resentment over U.S. sales of Japanese cars.

(The defendants received probationary sentences for manslaughter, but one of them was subsequently convicted under federal law for violating Chin's civil rights and sentenced to 25 years in prison. The Chin case was instrumental in drawing national attention toward Asian-directed violence.)

According to the Commission, one problem is that many citizens evidently do not see people of Asian or Pacific Island origin as the diverse groups they are, even though they come from many different societies and in many cases have been a component of the U.S. population for generations.

*Continued on page 9*

# SOFTWHERE

A new library of demographic personal-computer programs from the East-West Population Institute enables fertility estimation by indirect means, such as Palmore and Rele methods, own-children method, and cohort parity increment method from UN Manual X. This software – with the formidable name of EASWESPOP-FERTILITY – runs on the IBM PC and compatibles with MS-DOS 2.1 or higher, 256K memory, and one disk drive. Cost of software and documentation is $10.00 (check made payable to East-West Center). Write: Data Analysis Unit, East-West Center, Population Institute, 1777 East-West Rd., Honolulu, Hawaii 96848.

# SURVEY REPORT

## Zaire

The Republic of Zaire, formerly the Belgian Congo, is the largest country in land area of those lying entirely within sub-Saharan Africa. High fertility and mortality rates are creating a young population, while the growth rate seems to be hovering around 3 percent.

Zaire's first Contraceptive Prevalence Survey (CPS) was taken between 1982 and 1984, and conducted by the Zairian National Institute of Statistics, with financial and technical assistance from Westinghouse Health Systems. Previous demographic surveys date back to 1955. The current survey covers only four urban areas – including Kinshasa, the capital – and two rural areas. As have other African countries, Zaire has come to recognize that family planning can enhance maternal and child health. Zaire's CPS was designed to assist in evaluating family planning programs already in place.

The survey found that, in general, urban women are more educated than rural women, with about 42 percent having a secondary education compared with only 24 percent in rural areas. However, this difference does not seem to have much impact on fertility patterns.

The total fertility rate (TFR) of surveyed urban women ranged from the capital's low of 6.9 lifetime births per woman to a high of 8.1. In the rural areas surveyed the average number of births per woman is about 7.

The desire for more children among both groups of women is fairly high. Of those women wanting more children, the majority want to wait 1-2 years after the last birth, though this is not reflected in contraceptive use. Although 86 to 97 percent of the urban women (depending on the city) surveyed knew of some form of contraception, only 39 to 70 percent have ever used any method, and only an average of 20 percent were using any method at the time of the survey – and more than half of these used traditional methods. Contraceptive knowledge among rural women is about the same as that of urban women, thanks to the proximity of a hospital in one of the surveyed rural areas. Contraceptive use is highest in the area immediately surrounding the hospital; more women residing in that area were using contraceptives at the time of the survey than in any of the urban areas.

*– W.P.*

# DEMOGRAPHER'S PAGE

## Mexico's Population and Employment at the End of the Century

### by Victor L. Urquidi

*The following is from a speech given at the opening of the First Seminar on "Projections on Mexico's Population," Mexican Academy of Medical Demographic Research, Mexico City, Mar. 6, 1986.*

It is true that our country's impending problems hold our attention these days. It is also essential to scan further horizons. Indeed, population should not be the only issue under consideration, because in an overall view of Mexico's future one should consider such basic elements as its natural resources, social and political organization, economic problems, and the future of Mexico's relations with the rest of the world. But population, like the second hand of the clock, does not stop. More births than deaths take place each day, and as time passes society shows a much greater need to absorb, profit by, and look after its ever increasing number of people.

To tackle demographic issues, one needs projections based on historical facts. Rapid change in major variables, even if measured by tenths of percentages, has cumulative impact. The fact that the population growth rate is recorded with or without a few decimals should not be a matter of indifference, for every increment counts when accumulated. In the past we have forgotten this simple mathematical fact.

Since 1972-1973, when Mexico's population policy was articulated, the decreasing growth rate has become a key element in the country's future development strategy. However, let us not deceive ourselves with a figure that is already considered low by some. Mexico's estimated annual growth rate of 2 percent is still very high. It doubles our total population in 35 years and if this rate of growth is maintained, Mexico will have 164 million people in 2021. On the other hand, if birth rates decrease according to the goals and programs planned by the Government, we will enter the year 2000 with some 105 million people and the year 2021 with around 130 million.

### Mexico's Labor Force

The working groups in this seminar will focus on a number of projection issues: fertility, mortality, and others. I would like to concentrate on the growth and utilization of the labor force. As we were at least 10 years late in starting our population policy, we are still in the process of absorbing those people born before fertility rates started to decrease into the working ages and hence into the labor force.

> 700,000 to 800,000 young people flood Mexico's labor market each year. . . The task of generating jobs will be enormous

If the decrease had taken place in 1963 rather than 1973, the rate of increase in the labor force would have fallen by 1979. Given present dynamics, the labor force is still increasing rapidly and will continue to do so at least until 1989, and the labor force's growth rate will not show any significant decrease before the end of the century. We are in the typical situation of a country whose previous high birth rates and consequent broad-based age pyramid give rise to demographic momentum. In these conditions the economically active population grows faster than the total population for some time. Such is our case: Mexico's total population increases 2 percent per year, while our labor force is increasing at 3.4 percent.

Projections of the future labor force are thus shaped by past events—essentially by the fertility of the past 25 years and also decreasing mortality rates. The latter is a significant but not a determining factor. It is significant because mortality has decreased steadily over the past 20 years, especially infant mortality and mortality of children 14 years or younger. But it is not a determining factor because fertility weighs more heavily in population growth rates than does mortality. Even so, infant and child mortality continue to decline, bringing increased numbers of survivors aged 15 and over who sooner or later will join the labor force.

One can only speculate about international migration, because projections are not available, let alone analyses of migration's impact on the age distribution of today's and tomorrow's labor force. However, it is estimated that every year approximately 200,000 people emigrate more or less permanently from Mexico, and one can assume that these people are mainly working-age men and women who have been unable to find jobs in Mexico, and, due to wage differentials, family reasons, or other causes, have decided to migrate.

Because labor markets in Mexico, like the U.S., are segmented, it is difficult to ascertain the impact of migration. It is generally held that migrants are drawn out of the Mexican labor force and that they depart carrying with them ever higher skills. In some parts of northern Mexico skilled labor is scarce, not because there is no local demand for it, but because the human resources are emigrating, either temporarily or permanently.

We need to focus on the future of immigration. There have always been flows of individuals moving for professional and other reasons. But in recent years we have started to notice the presence of refugees and (excepting

Victor L. Urquidi, an economist, is former
President, El Colegio de Mexico and The
Bank of Mexico

Art Haupt

Mexican underemployment: A young souvenir hawker works the stalled Mexico City traffic

Guatemalan peasants) increasing numbers of skilled and semiskilled laborers from Central America – all of which is having an impact on Mexico's labor markets.

In view of the segmentation of the labor market, I don't want to overemphasize this issue, since immigrants do not always displace nationals. The point is that they have an impact on job opportunities in Mexico just as Mexican migrants in the U.S. fill gaps in the structural demand for workers where segmented supply is inadequate. It is very likely that so long as the growing labor force in Central America does not find sufficient job opportunities in the region, the tendency to cross the borders and enter Mexico in search of employment will be very strong.

## 1 Million New Jobs a Year

The experts downplay the demographic effects of these flows, including labor force growth. The current size of Mexico's labor force is uncertain, but it probably doesn't exceed 24 million. Of an estimated 1986 population of 82 million, that is almost 30 percent, perhaps a little less. There is little doubt, however, that of those 24 million, open unemployment represents about 3.5 million. Of the 20.5 million employed, some 40 percent, or approximately 9 million, are underemployed or hold informal jobs, which leaves some 11.5 million people holding regular jobs.

Since 4 million people work in government or in quasi-governmental organizations, the productive economy absorbs only 7.5 million, of which at least 5 million are employed in industrial jobs and the rest in services and primary activities. The problem before us, for the near as well as the far future, is that the country's population growth each year floods the labor market with an additional 700,000 to 800,000 young people in search of jobs.

> There will be many more jobs by 2000, but there will also be more unemployment and underemployment—a paradoxical situation

Suppose the objective were to have a labor force of some 40 million in the year 2000, with a population that would be 105 million if projected decreases in birth rates occur. The labor force would then rise to 38 percent of total population, as against the current 30 percent. Furthermore, if in the year 2000 we want lower rates of open unemployment, say 6 percent, as opposed to today's 13 to 14 percent, Mexico would have to create an additional 15 million jobs – a million a year. These calculations incorporate possible increases in labor force participation among young people and women, who still participate in relatively small numbers.

It is obvious that the task of generating jobs will be enormous. To reach that goal, job creation will have to be much higher than in the last 15 years. Required increases in formal sector employment will have to be at levels which in the past have been reached only in years of exceptional economic growth. The figure of 15 million new jobs over 15 years could shift for several reasons: for example, if annual migration to the U.S. or other countries with high levels of per capita income were to increase; if the projection of large immigration from Central America did not materialize; if the educational system were to retain the school-age population for a longer time, and on a full-time basis, in high school or higher education; or if participation of women in the labor force did not increase.

Some of these alternatives presume increases in family income in Mexico that would relieve the need for women's labor, or presume that young people would remain underemployed during their part-time enrollment in the school system, or that economic prosperity in Mexico would make emigration less attractive. Productive self-employment could also increase in the informal sector, though we know little about this option.

Meanwhile, in Mexico as in other countries, modern technologies are having their labor-disrupting effect in industrial production and services by displacing unskilled and even semiskilled labor, no matter how much they

*Continued on next page*

## Mexico's Employment

*Continued from preceding page*

tend also to generate employment in new activities.

It is difficult to forecast all the possibilities, since they depend on other factors related to economic and social development as a whole, but they should be taken account of in any extensive and serious study of the problem. Since the 1970s no general study has been made on employment prospects, and it is urgently needed.

If there's any truth to these points, it's likely that we will succeed in increasing jobs by 2000, but there will also be more unemployment and underemployment – a paradoxical situation that deserves serious examination.

This conclusion is not just demographic determinism. It may well be argued that with future development, Mexico should be able to provide productive employment for its labor force. But we know that to obtain economic growth adequate to absorb the increasing labor force, reduce present unemployment, and also lower underemployment, a series of extraordinary requirements will have to be fulfilled, all of them entailing higher real rates of investment than in the past, present, and foreseeable future.

In certain periods, Mexico's economy has been able to develop at a fast pace, though with the help of substantial borrowing to supplement domestic savings. Now we're talking not of simple extrapolations from past experience, but about fundamental shifts in the economic structure that will have to be efficient both in terms of achieving higher per capita income, and in creating enough jobs to reduce the specter of open unemployment and chronic underemployment that Mexico faces today.

Essential among the requirements to stimulate employment growth is increased agricultural productivity to expand the domestic market. Increased industrial productivity is also needed to spur exports of manufactured goods, especially those of labor-intensive industries. It may seem contradictory to affirm that by increasing productivity, employment will increase, since it is usually assumed that greater productivity means more production with less labor. Nonetheless, a global, integrated perspective is required, not just one that focuses on labor or an isolated production unit. Machines can also be more productive, more efficient. And the economy as a whole could function with a higher degree of collective efficiency.

Returning to the demographic perspective, it should be emphasized that even if the economy grows at rates higher than those we now foresee, Mexico will still have an oversupply of labor over the next 15 years, especially in the next 8 to 10. This requires real rethinking of the concept of "employment" in the future. There is a tendency to regard employment too much in terms of salaried jobs listed on a regular payroll, so typical of bureaucratic systems which assure employment and wages (but not productivity). This phenomenon also characterizes many state-run and private sector enterprises.

As is the case in Europe and other regions, informal employment, including self-employment, is gaining ground and should not be considered an aberration as long as it is productive. Some countries are heading toward a situation in which "employment" will alternate with education and reeducation, or recycling, rest, and leisure. New kinds of employment will be found, as well as new ways to utilize human resources in working ages. So-called "full employment" will probably never be attained, but neither will "full unemployment." Social security and social responsibility mechanisms will have to be devised for the unemployed and partly employed. In short, we may be living in an "end of employment" era.

Needless to say, as long as population policy is strongly geared towards the reduction of fertility, as Mexico has belatedly done since 1974, this scenario will be alleviated to a certain extent. Some may consider it overly pessimistic, but it deserves serious consideration. If instead of 105 million people in 2000 we increase only to 95 million – which would require unprecedented efforts in family planning – we would undoubtedly be in a better position to face the problems of the 21st century. But that would still not ease the problems we face over the next 15 years. ☐

*Translation from Spanish by PRB*

# Mission Accomplished In Singapore

Over the past few years, Singapore (population 2.6 million) has completed its transition to low fertility. In recognition of this, the Singapore Population and Family Planning Board, established in 1965, is winding down its activities, its objectives achieved.

Singapore's total fertility rate has fallen from 4.9 average lifetime births per woman in 1965 to 1.7, well below the approximately 2.1 level of fertility necessary for replacement. Singapore is still growing at about 1.1 percent per year, however, because of the great number of women in the childbearing ages of 15-49. Everything else being equal, this growth rate should eventually fall.

The Population and Family Planning Board's family planning and demographic functions will be integrated into other government bodies, such as the Ministry of Health. *– A.H.*

# Access to U.S.'s Last IUD Limited

The Alza Corporation, manufacturers of the only intrauterine device (IUD) available in the U.S., is undergoing an "internal evaluation" of its marketing procedures. During this evaluation, expected to end by fall 1986, Alza will sell the IUD only to current customers, and only at those customers' 1985 buying levels. This effectively closes the door on any woman interested in commencing use of the IUD.

In February, the G.D. Searle Corporation announced that they were stopping U.S. sales of their IUDs, the Copper-7 and TATUM-T, because of "unwarranted" lawsuits and the unavailability of affordable liability insurance.

Will Alza follow suit and discontinue marketing of its hormone-releasing Progestasert-T IUD? If so, the small number of effective contraceptive methods available to American women will become one fewer. *– J.A.*

### All-Africa Conference

*Continued from page 3*

In preparing the publications, IMPACT—like RAPID, a contract with the U.S. Agency for International Development—carried out its mandate to improve the use of population information and research findings by policymakers in developing countries. Using sophisticated graphics, the IMPACT team creates materials on a variety of key population topics, packages them impressively, and distributes them to leadership audiences in the developing world. IMPACT provides technical assistance and support to selected LDC institutions that want to disseminate research findings on population and family planning to their own leadership groups, and also produces *ad hoc* material for special briefings and conferences, of which Harare was an outstanding example. *—J.A., A.H.*

### Anti-Asian Violence

*Continued from page 5*

Asian Americans number about 5.1 million, about 2.1 percent of the U.S. population as of 1985, according to PRB estimates. Since immigration law reform in 1965 and the influx of Southeast Asian refugees following the Vietnam War, this population group has grown more rapidly. (See PRB's *Bulletin* for October 1985, "Asian Americans: Growth, Change, and Diversity.") In 1985, 264,691 immigrants to the U.S., i.e., 46 percent of legal immigrants, were Asians. They are concentrated more in some areas than others, but even in the San Francisco area, where Asians are considered concentrated, they account for only 1.12 percent of the total metro area population.

Statistics on the level of violence against Asians are hard to come by, a situation the Commission hopes its findings will help correct. An independent fact-finding agency of the Executive Branch, the Commission has been researching the dilemma since 1984, with field investigations in eight states. The report, "Recent Activity Against Citizens and Residents of Asian Descent," was approved by the Commission in June and will be published in late summer 1986. *—A.H.*

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## ANSWERS

Answers to "Speaking Graphically," page 2: (a) Iceland; (b) Czechoslovakia; (c) Hungary; (d) Austria; (e) Bulgaria; (f) Belgium.

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# POSITIONS/PROFESSIONALS

**Project Director,** International Clearinghouse on Adolescent Fertility of the Center for Population Options, to provide overall supervision and coordination of international project involving information collection, assistance, and grants for youth workers in adolescent pregnancy prevention/sexuality education. The International Clearinghouse on Adolescent Fertility collects, analyzes and distributes materials related to sexuality education/adolescent pregnancy prevention to program staff who reach young people in developing countries. As needed, it creates new program resources in English, Spanish, and French, and offers technical assistance to increase effective programming for adolescents. *Specific duties:* project strategy, staff supervision, translation supervision, development of periodic and new materials, communication and cooperation with allied groups, project evaluation, assistance in securing funds. *Qualifications:* bilingual in Spanish/English and bicultural, international experience, knowledge of field, training experience helpful. *Salary:* negotiable. *Contact:* Judith Senderowitz, Executive Director, Center for Population Options, 1012 14th St. N.W., Suite 1200, Washington, D.C. 20005.

# POPULATION UPDATE

### Estimated United States Population:

| | |
|---|---|
| As of February 1, 1986 | 240,640,000 |
| As of February 1, 1985 | 238,400,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, Current Population Reports, Series P-25, No. 983.

### Estimated World Population:

| | |
|---|---|
| As of July 1986 | 4,942,000,000 |
| Annual growth | 83,000,000 |

From estimates on PRB's 1986 World Population Data Sheet.

### Latest Provisional Statistics for the U.S.: February 1986

| | 12 months ending with February | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1986 | 1985 | 1986 | 1985 | 1984 | 1983 |
| Live births | 3,729,000 | 3,687,000 | 15.6 | 15.6 | 15.5 | 15.9 |
| Deaths | 2,074,000 | 2,070,000 | 8.7 | 8.8 | 8.6 | 8.6 |
| Natural increase | 1,655,000 | 1,617,000 | 6.9 | 6.8 | 6.9 | 7.3 |
| Marriages | 2,427,000 | 2,462,000 | 10.2 | 10.4 | 10.5 | 10.8 |
| Divorces | 1,188,000 | 1,154,000 | 5.0 | 4.9 | 5.0 | 5.1 |
| Infant deaths | 39,300 | 39,300 | 10.6 | 10.7 | 10.8 | 11.2 |
| Population base (in millions) | | | 238.7 | 236.5 | 234.2 | 231.9 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births. Rates are based on revised population estimates from the 1980 Census.

*Source. Monthly Vital Statistics Report* (Vol. 35, No. 2) from the National Center for Health Statistics.

# NEW FROM PRB

**Population Handbook, International Edition:** PRB's International edition of the popular *Population Handbook* is now ready in the "revised edition." Like the updated original version, this revision features added and expanded sections on the life table, total fertility rate, and other features. The 76-page *Handbook* has been updated with new statistical examples and graphics from a variety of nations, and contains a revised section on sources of data. Also in the works is a revision of the French language edition, expected in several months. Prices for the *Handbook* are $5.00 per single copy; 2-49 copies, $4.50 ea.; 50-99, $4.00, 100 or more, prices on request.

**1986 World Population Data Sheet in Two More Languages:** In response to many suggestions, the *World Population Data Sheet* is now available in French and Spanish language editions. These editions are identical in format to the English versions. Prices for the *1986 World Population Data Sheet, Données démographiques*, and *1986 Datos demográficos de la población mundial* are $2.00 per single copy; 2-10 copies, $1.75 ea.; 11-50, $1.50; over 50, $1.25.

**The World's Women Teaching Kit:** Targeted to teachers of high school and college classes, this kit contains PRB's "World's Women: A Profile" Data Sheet; "Women A World Survey," a colorful 44-page publication of statistics about women by Ruth Sivard; a 4-page *Population Education Interchange*; a 16-page teaching module on women; and two student worksheets. Price: $7.50, complete. Buy 25 or more kits and get a 25 percent discount. *—C.H.*

Send order to PRB, Circulation Dept., PO Box 35012, Washington, DC 20013. Orders of $20.00 or less must be prepaid. Please add $1.00 for postage and handling. Orders over $20.00 may be billed with applicable postage and handling charges added. International orders: Please add $1.00 or 25 percent of the cost of publications ordered (whichever is greater) to cover postage and handling.

# TAKE A NUMBER

**Fertility and Revolution:** Several observers have noticed that on the *World Population Data Sheet* Hungary is shown to have the same negative growth rate (−0.2 percent) as West Germany, although German fertility is quite a bit lower. It seems surprising that both countries would have the same negative rate of natural increase, since Germany's total fertility rate (TFR) is 1.3 children per woman compared to Hungary's 1.7. The explanation lies in the effect that the 1956 Revolt and its aftermath had on fertility. Hungary was in the midst of a modest postwar "baby boom" in 1955 with a TFR of 2.8. But, fertility dropped immediately after the Revolt, reaching 1.8 in 1962. After that, fertility climbed to a TFR of 2.4 in 1975. Since then, Hungarian birth rates have slowly declined in the manner of most more developed countries.

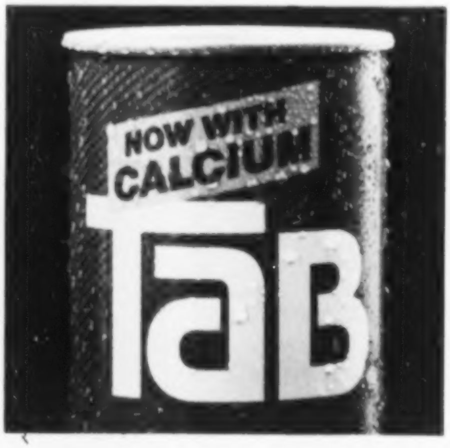
In Hungary, fertility peaks sharply at 20-24 and, in 1982, this age group was about 300,000 smaller than it might have been if Hungary's mini-baby boom had been maintained. And the 15-19 group was smaller still. If the post-Revolt baby bust had not occurred, Hungary would almost certainly not be in a state of population decline today. Hungary may well see its growth rate rise when the larger birth cohorts of the 1970s reach childbearing age. Another lesson on the often powerful effects of age distribution on a population's dynamics.

**Baby Not On Board?:** The prospects for continued increase in childlessness in the U.S. seem good, according to an interpretation of data collected by the Census Bureau in the Current Population Survey (CPS) of June 1985. In 1985, 26.2 percent of American women aged 30-34 had no children. Although data on birth expectations indicate that about half of those women do expect to have a birth, past evidence suggests otherwise. In 1980, for example, 19.8 percent of women 30-34 were childless; five years later, this cohort's childless percentage had dropped only to 16.7 percent.

Data on birth expectations in the CPS indicate once again that American women say that they expect to have about 2.1 children each. Of the women surveyed, 10 percent said that they expected to remain childless. However, 13 percent said that they were uncertain as to their birth expectations while another 17 percent failed to respond at all. There is evidence that these women are more likely to give a response of "no births expected" when they do reply to the question in later surveys. *—C.H.*

# ADDENDA

## Signs of the Inexorable Aging of America–IV



Coca-Cola is test-marketing Tab with calcium (10 percent of the recommended daily allowance per 12-ounce serving). With new concerns about calcium deficiency and osteoporosis, the sugar-free diet cola's appeal seems to be no longer just for weight and fashion, but for health. Tab itself is now 23 years old, by the way.

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

### GO TO THE PEOPLE: Releasing the Rural Poor Through the People's School System,

by James B. Mayfield. West Hartford, Conn.: Kumarian Press, 1986. 200 pages. $15.95, paper. ISBN 0-931816-46-7.

Rural development programs in Third World countries since World War II have tested numerous models, each falling short of expectations. Early postwar approaches were generally one-way systems of service delivery and technology transfer employing communication from the top down. Peasant farmers were seen as passive recipients of western technology.

The Green Revolution of the 1960s saw community development generalists replaced by agricultural extension specialists. Unfortunately only the middle- and large-scale farmers, who owned land and could afford the inputs necessary to capitalize on new technology, were served.

As each new model became established, its advocates tended to perceive it as representing new wisdom capable of correcting past mistakes. *Go to the People* describes an approach introduced in China over 40 years ago, the principles of which are not only consistent with the latest thinking on rural development, but can be used as a standard by which more recent strategies can be measured.

The "mass education movement," conceived by Dr. James Yen, was originally directed to reducing illiteracy. It became the rationale for establishing the Chinese-American Joint Commission on Rural Reconstruction dealing with different aspects of agriculture, along with public health and land tenure reform. Dr. Yen's concept, later adapted in the Philippines, was carried out through "People's Schools," which catered to the least advantaged peasants and stressed that rural people should be taught to do things for themselves. The people, acting as paraprofessional agents and educators, control their own organizations while village and municipal leaders actively coordinate the efforts.

Mayfield's thorough review of the literature (some 300 references), his personal acquaintance with Dr. Yen's work, and his skill in defining the principles of effective rural development make this an outstanding contribution. It is especially appropriate at this time when the importance of local initiative and private sector involvement is gaining credence.

*—Robert P. Worrall*

### POPULATION THOUGHT IN THE AGE OF THE DEMOGRAPHIC REVOLUTION,

by James C. Riley. Durham, N.C.: Carolina Academic Press, 1985. 225 pages. $24.75. ISBN 0-89089-2571.

In the 1700s, European populations began to grow markedly as mortality rates declined. Riley's engrossing history shows how this unexpected trend—dimly perceived at first—influenced the intellectual thought of the period. Powerful new tools of science and mathematics made it possible to analyze population dynamics as never before. Meanwhile, traditional optimistic assumptions about population growth were coming into question. By century's end, Riley shows, more ambivalent views had emerged as to humanity's ability to fit into its world, culminating in the work of Thomas Malthus.

*—Art Haupt*

### ATLAS OF NORTH AMERICA,

by the National Geographic Society. Washington, D.C.: National Geographic, 1985. 264 pages. $39.95; $29.95, soft cover. ISBN 0-87044-607-X.

Unique among currently published atlases, this new *Atlas of North America* contains some of the latest applications of space mapping technology, resulting in a clear and colorful view of the surface of the continent of North America. (Central America, the Caribbean, and Hawaii are also included.)

The maps are of large scale and wide-ranging in their information, including the lithosphere, climate, resources, land use and population—information especially welcome to anyone interested in biological aspects of the environment.

More than just a book of maps, the atlas also incorporates useful geographical information on flora and fauna of states, parks, and woodlands. This National Geographic publication is truly "a space age portrait of a continent"—an important publication which belongs in the libraries of all whose work requires access to the most current geographic presentation.

*—Walter B. Hope*
*Assistant Professor of Geography*
*Howard University*

## Books Received

**ABORTION, MEDICINE, AND THE LAW** (3rd edition, revised), edited by J. Douglas Butler and David F. Walbert. New York: Facts on File, 1986. 795 pages. $40.00.

**ASIAN LABOR MIGRATION: Pipeline to the Middle East**, edited by Fred Arnold and Nasra M. Shah. Boulder, Colo.: Westview Press, 1986. 265 pages. $26.50.

**CHOICE AND CIRCUMSTANCE: Racial Differences in Adolescent Sexuality and Fertility**, by Kristin A. Moore, et al. New Brunswick, N.J.: Transaction Books, 1986. 150 pages. $19.95.

**ESTIMATES OF PUBLIC COSTS FOR TEENAGE CHILDBEARING: A Review of Recent Studies and Estimates of 1985 Public Costs**, by Martha R. Burt. Washington, D.C.: Center for Population Options, 1986. 39 pages. $8.00.

**MIGRATION ACROSS TIME AND NATIONS,** edited by Ira Glazier and Luigi De Rosa. New York: Homes & Meier, 1986. 384 pages. $49.50.

**MONITORING CHILDREN'S HEALTH: Key Indicators**, by C. Arden Miller et al. Washington, D.C.: American Public Health Association, 1986. 124 pages. $15.00.

# SPOTLIGHT

## HAWAII

**Population (mid-1985 estimate): 1,053,900**
**Land area: 6,425 sq. miles**
**Births per 1,000 pop. (1985): 17.3**
**Deaths per 1,000 pop. (1985): 5.5**
**Rate of natural increase (1985): 1.2 percent**
**Total fertility rate (1980): 2.1**
**Infant mortality rate (1985): 8.7 infant deaths per 1,000 live births**
**Life expectancy at birth (1979-81): 77 years**
**Capital: Honolulu**
**State fish: Humuhumunukunukuapu'aa**

### by Robert Gardner

The only state in the United States surrounded entirely by water, Hawaii is a fascinating place, and is almost a demographic laboratory.

Hawaii was the last state to enter the Union, in 1959. Its history as part of the United States, however, goes back to the late 19th century, and its involvement with the U.S. much farther than that. "Discovered" by Captain James Cook in 1778, Hawaii was first populated as early as AD 500, by settlers from the Marquesas, and by Tahitians between AD 900 and 1300. Most estimates of the population living in Hawaii when Cook arrived range from 200,000 to 400,000.

Diseases from Europe and other factors led to a rapid decline in the number of Hawaiians, and today there are few pure-blooded Hawaiians left, although the number of part-Hawaiians was estimated to be almost 190,000 in 1983.

In Hawaii, as in no other state, no single ethnic group constitutes a majority of the population. Instead, according to the 1980 Census, 34 percent of the population was white, 25 percent Japanese, 14 percent Filipino, 12 percent Hawaiian (as self-identified or arbitrarily allocated), 6 percent Chinese, with smaller percentages of a host of other groups. Almost half the population was Asian. In 1984, however, only 38 percent of civilian births in the state were "unmixed," indicating an ongoing process which is making such ethnic statistics less and less meaningful.

The population of Hawaii can be divided along lines other than ethnic. For example, the state is home to a large number of military personnel and their dependents, numbering well over 100,000. The demographic characteristics of this group, its young age structure, relatively high level of fertility, and rapid in- and out-migration, make understanding the demography of the state a complicated and interesting endeavor.

Migration has been a central feature of the state's demography and society since the first Polynesian immigrants arrived. Often the immigrants entered Hawaii on the bottom rung of the societal ladder, such as by doing farm labor in the fields of the great plantations. Lengthy residence brought with it a rise on the social scale. Typically this pattern was mirrored in the mortality levels of the various groups. Recent arrivals usually had relatively high mortality, while the more established, better-off groups had lower levels. Today, mortality differentials have narrowed, and the state as a whole consistently enjoys the lowest mortality levels of the country. In 1980, while life expectancy for the United States stood at 73.7 years, for Hawaii it was 77.0 years.

Immigration from other countries and in-migration from other states have contributed, along with natural increase, to rapid growth in Hawaii's population, averaging 2.3 percent annually in this century, compared to 1.4 percent for the U.S. as a whole. This population growth is of concern to many residents, given the limiting aspects of Hawaii's environment. The state is dependent on the outside world for most of its day-to-day supplies. Very little of the food consumed in Hawaii is grown there, and very few of the manufactured products used there are produced there. The single most important industry is tourism, which is booming today but could bust in the future for any number of reasons.

Hawaii Visitors Bureau

Statue of King Kamehameha, first ruler of Hawaii and unifier of the islands.

One important demographic factor, migration, is beyond the state's control. Hawaii, like some areas of the mainland, receives a disproportionate number of immigrants in relation to its resident population. Immigration is controlled by the federal government, not the state government. Similarly, internal migration is protected by the Constitution, so any legal efforts to restrict movement from other states are impossible. Migration to Hawaii will probably continue until the islands lose their attractiveness – a direct result of that very migration, say opponents of migration and growth.

Hawaii was the first state in the nation to have a Population Commission, which was formed to find out more about the demography of the state and to make recommendations for state government action. The Commission held numerous meetings and produced several studies, but recently lost its separate existence and was absorbed into the State Department of Planning and Economic Development. It nevertheless remains true that concern and interest in local population matters are probably as high in Hawaii as in any state in the union, and that Hawaii will continue to have a unique demographic situation.

Bob Gardner is the 1985-1986 Andrew W. Mellon Visiting Scholar at PRB and Research Associate at the East-West Population Institute, Honolulu. He wishes to thank Bob Schmitt for his assistance with this *Spotlight*.

# POPULATION TODAY

Vol 14, No. 9 September 1986

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"I feel you tremble in my arms . . ." See page 5.

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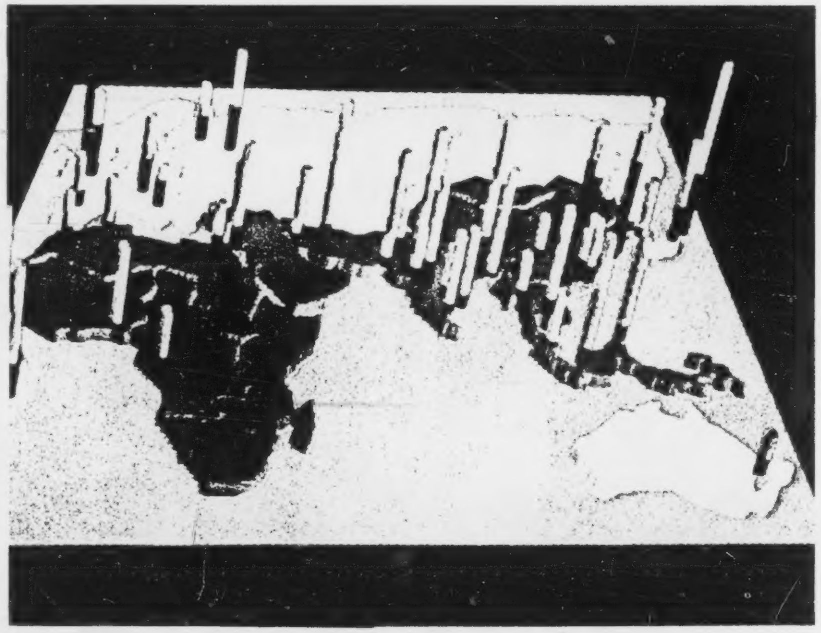
# FROM THE EDITOR'S DESK

To many people, job exporting means the loss of blue-collar positions as autos are assembled in Seoul, Korea, instead of Lordstown, Ohio. But as *Time* magazine recently reported, some 15,000 keypunching and other white-collar tasks have also flown out of country to the Caribbean, Ireland, and Asia. Clerical labor is cheaper overseas, transferring the electronic bits and bytes back to the U.S. is a breeze, and unlike Hyundai cars, business documents and electronic data can cross borders duty-free.

But why stop at office work? There must be a lot of writing talent among the world's half a billion English speakers, not all of whom live in the borough of Manhattan. Why pay top dollar at home if you could order out (at bargain prices, with overnight service) for a "genuine" John Updike-clone novel (*Rabbit Rerun?*) or a cultured newspaper column "as good as" William Buckley's (*Tempora Mutandor?*). Just send money to the Famous Writers Factory, Somewhere in East Asia. Better yet, Telex it.

*—Art Haupt*

# SPEAKING GRAPHICALLY



**Pole Vault**. The above map, produced on a graphic supercomputer, shows the population of major world cities as poles. The dark portion of the poles represents each city's population in 1950. The light-colored portions show population projected as of 2000. Cities with 4 million or more (as projected in 2000) are shown; the vast majority will be in the less developed world.

This map appears in *Population Images*, a 20-page booklet recently published by the UN Fund for Population Activities. To obtain a copy, contact: UNFPA Policy and Evaluation Division, 220 E. 42nd St., 17th floor, New York, N.Y. 10017, Attn: Dr. Jose Donayre, Deputy Chief.

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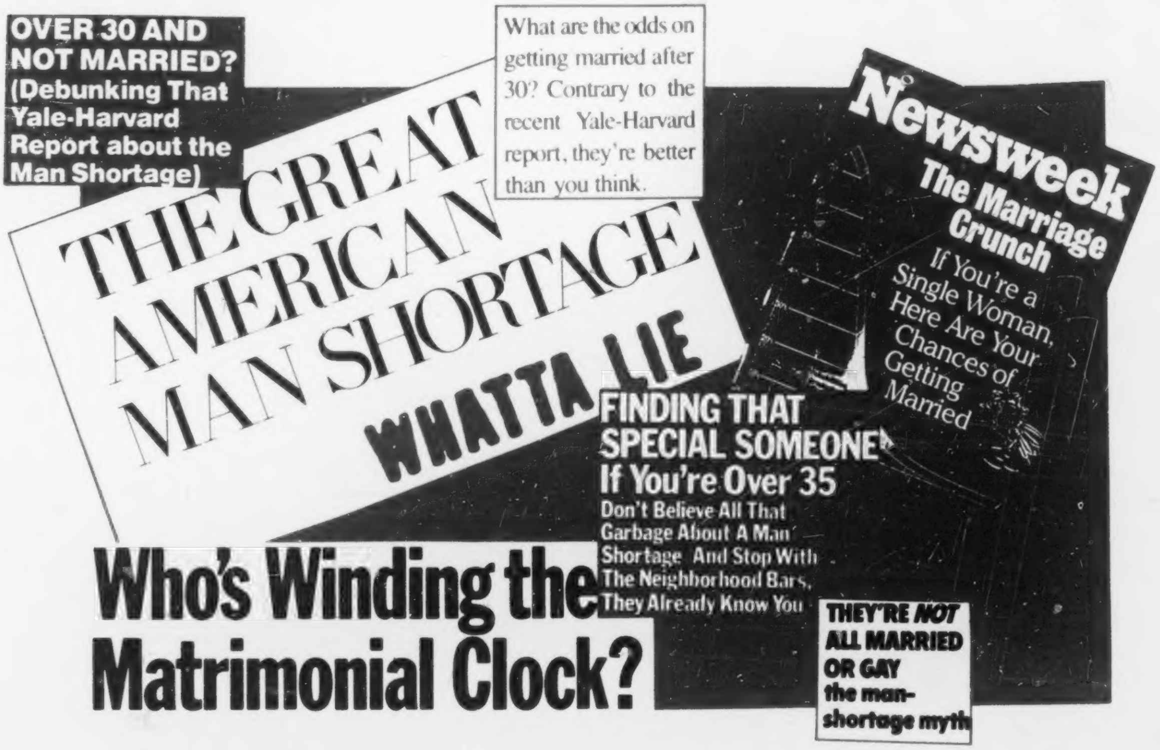
*Educators and students should send supporting documentation.

# Demography as a Media Event



OVER 30 AND NOT MARRIED? (Debunking That Yale-Harvard Report about the Man Shortage)

What are the odds on getting married after 30? Contrary to the recent Yale-Harvard report, they're better than you think.

Newsweek

The Marriage Crunch

If You're a Single Woman, Here Are Your Chances of Getting Married

THE GREAT AMERICAN MAN SHORTAGE

WHATTA LIE

FINDING THAT SPECIAL SOMEONE If You're Over 35

Don't Believe All That Garbage About A Man Shortage And Stop With The Neighborhood Bars, They Already Know You

Who's Winding the Matrimonial Clock?

THEY'RE *NOT* ALL MARRIED OR GAY the man-shortage myth

The American public is given little opportunity to read about demographic studies. Media attention is often an elusive commodity for demographic researchers, but in the "publish or perish" academic world in which many research-oriented demographers thrive, the media spotlight can be an important barometer of success.

Once in a blue moon the media seize on a demographic topic and turn it into an *event*. Such was the case with a study of "Marriage Patterns in the United States," by Neil G. Bennett, David E. Bloom, and Patricia H. Craig. In this – as yet unpublished – study, Bennett and Craig, sociologists at Yale University, and Bloom, a Harvard economist, investigated why period marriage rates were declining: Was it a result of women delaying marriage or foregoing it entirely? They concluded that to a surprising extent women were, in fact, foregoing marriage.

The researchers used the Coale-McNeil marriage model to analyze survey data on age at first marriage for successive birth cohorts. Their data came from the Census Bureau's 1982 Current Population Survey.

The most widely reported of the study's conclusions seemed tailor-made for the media: The study showed that only 20 percent of college-educated women born in the mid-1950s who reach the age of 30 without marrying can expect to marry. Thirty-five-year-olds have a 5 percent chance, while the percentage for 40-year-olds is about 1 percent.

## The Media Blitz

The popular media turned these conclusions into one of those rare stories that permeates the public consciousness. The authors put out no news release on the study. Instead, the story got out last February when a reporter from a Stamford, Conn. newspaper phoned Bennett for some help interpreting some marriage statistics. He told her about the new statistics he and his colleagues had come up with, and it made the front page of the *Stamford Advocate*. The Associated Press then picked it up and it spread throughout the country. Thus, what started with an innocuous phone call turned into a *Newsweek* cover story and appearances by the authors on, among other television shows, 'Donahue" and "Good Morning America."

Almost as interesting as the television programs on which the authors appeared (such as "Hour Magazine," with guest interviewer Pia Zadora) are those the authors refused: ABC's "Nightline," and "The Dr. Ruth Show," for example. They also turned down interviews on all three networks' morning news programs, though they accepted a second offer from "Good Morning America."

The *Newsweek* story was what caused the public to sit up and take notice – and prompted millions of women to start worrying. On June 2, 1986, for the first time since the high inflation of the mid-1970s, the weekly magazine used a graph as its cover illustration. This graph showed marriage probabilities for college educated women.

A grim, underlying message of the *Newsweek* article and others like it is that women have brought on their own marital woes by foregoing marriage when they were young in favor of pursuing a career. Strike while the iron is hot, the story implicitly warned, or risk a lifetime without a husband. This conclusion does not sit well with the

*Continued on page 8*

# PRB on the Move in Mali, Mexico

Concern about population problems has deepened among national leaders in many African countries recently. A measure of this concern was last summer's Seminar on Demographic Growth and the Quality of Malian Family Life, held in Bamako, Mali, June 16-21.

The Seminar was organized by the Malian Family Planning Association (AMPPF), affiliated with the International Planned Parenthood Federation (IPPF). It convened nearly 50 representatives of Malian women, youth, worker, and religious organizations.

PRB's IMPACT program provided technical support to the meeting, in the form of materials and demographic data. IMPACT staffer Pietronella van den Oever acted as a demographic resource person.

Participants at the weeklong seminar were briefed on the consequences of rapid population growth on different sectors of the economy. By seminar's end, a drafting committee prepared recommendations to the government, proposing policies to counteract population growth's negative consequences.

The meeting marked the first time Malian national religious leaders have participated in a major national family planning meeting. In a pattern that has been repeated in many less developed countries over the past decade, the participants evidenced sensitivity to the problems of rapid population increase. Islam is the predominant religion in Mali, and the Islamic leaders attending endorsed wide implementation of family planning services as well as education in the use of contraceptives. Passages from the Koran were cited to interpret the Prophet's ideas on family life, and the leaders emphasized their religion's capability for adapting to changing times.

### Meanwhile, on the U.S.-Mexico Border

In July 1986 two PRB staffers, Vice President Leon F. Bouvier and Visiting Scholar Robert Gardner, viewed firsthand the operations of the U.S. Border Patrol on the San Diego-Tijuana border. Their impressions, while anecdotal (as opposed to demographic) are worth relating here:

Patrice van de Walle

Malian mother and child.

- Observation of the border at night confirmed that the numbers of illegal commuters and/or migrants crossing from Mexico to the U.S. are (to use a statistically inexact description) "incredible."
- Enforcement is, everything considered, relatively nonviolent and good-natured, with a sort of Chutes and Ladders dynamic to it; the punishment for being captured is a free trip back to Square One. Border Patrol officers have a high morale and sense of mission. They witness the enormous migration flow every day without an undue sense of frustration, apparently seeing their mission as "keeping the lid on," i.e., providing a presence and some deterrent to what would otherwise be an ungoverned migration flow. *—A.H.*

# PAA Elects Officers

In August the Population Association of America announced the results of the 1986 PAA election. The new officers:

*President Elect*: Reynolds Farley

*First Vice President*: Larry Bumpass

*Second Vice President*: Julie DaVanzo

*Board of Directors*: Nancy Birdsall; William Butz; Jeffery Evans; Frances Kobrin Goldscheider

*Publications Committee*: Charles Hirschman

*Nominating Committee*: Tom Espenshade; Jane Menken; Tom Merrick

In keeping with PAA election policy, Farley will serve as President-Elect of the organization in 1987 and succeed Ronald D. Lee as President in 1988.

# UNFPA Aid Halted

The U.S. Agency for International Development (AID) has halted funding for the UN Fund for Population Activities. The reason: U.S. objections to China's family planning program, which, U.S. officials charge, implements coercive sterilization and abortion.

For the past year, the U.S. and the UN group had been jousting about whether UNFPA would continue to receive funding. U.S. policy bars funding of nongovernmental organizations that promote abortion in other countries. Whether UNFPA fits this definition has been a matter of some dispute.

Previously, the U.S. had contributed some 27 percent of the UN agency's budget. But in December 1985 AID withheld $10 million of the $46 million appropriated for FY 1985 and arranged for the remainder to be sequestered so that no U.S. funds reached China's program via UNFPA. In the most recent development, the $25 million appropriated for UNFPA for FY 1986 but never released will be reprogrammed for other activities.

Press reports have alleged systematic coercion in China's program, though China's government insists that abuses do not reflect official policy and have been corrected. UNFPA, for its part, supplies China with demographic and teaching assistance, and does not sponsor Chinese family planning programs.

An ironic twist to the story is that UNFPA funds made it possible to gather the data on which some of the allegations were based.

Administration officials have publicly vowed that the ban does not represent a change in U.S. support for family planning per se. The withheld funds, AID reports, will be used for other voluntary "family programming activities," divided as follows: $2.77 million in Africa; $2.69 million in Asia and the Near East; $5.74 million in Latin America and the Caribbean; and $13.78 million for family planning activities worldwide.

Because the U.S. funds cutoff had been expected, UNFPA had already raised $20 million from other donors to help make up the lost funds. *—A.H.*

# Call for Visiting Scholar Applications

Applications are invited for PRB's Visiting Scholar Award for the nine-month period beginning September 1987.

The recipient of the Award, made available under a grant from the Andrew W. Mellon Foundation, will be expected to spend at least nine months at PRB's Washington, DC., headquarters carrying out a population-policy-related project of either domestic or international focus. Priority will be given to policy-oriented projects that attempt to synthesize work on a particular topic (including the scholar's own contribution). Proposals for new research activities will also be considered.

Interested individuals should forward a brief description of their planned activities together with a curriculum vitae and a sample of recent publications no later than Dec. 15, 1986, to: Visiting Scholar Program, Population Reference Bureau, 777 14th St. NW. #800, Washington, DC. 20005. For further information, call Tom Merrick at (202) 639-8040.

The negotiable stipend is comparable with academic salaries, and includes the cost of transportation to and from Washington, DC. Applicants are requested to submit a brief estimate of their transportation costs and salary requirements; applications combining the fellowship with a sabbatical leave are encouraged.

Announcement of the recipient of the 1987-1988 Visiting Scholar Award will be made on Feb. 1, 1987.

# Songs Get The Message Across

*Whenever I'm by your side*
*I forget everything, I don't*
*understand reasons*
*But when I kiss your lips*
*I feel you tremble in my arms*
*And you tell me to wait,*
*That it's not time to give ourselves*
*everything*

Abstinence can be provocative. These lyrics come from the Number 1 song in Mexico last spring, sung by that country's popular musical duo Tatiana and Johnny.

The song, "Cuando Estemos Juntos [When We're Together]," sung by teens for teens, endeavors to dramatize through the medium of popular music the sexual dilemma many teenagers face. The goal: preventing teen pregnancy. The idea came from the Population Communication Services program of The Johns Hopkins University, under contract with the U.S. Agency for International Development (AID). Patrick L. Coleman, coordinator for the Hopkins program, was the innovator of this unique approach.

EMI, the giant recording company, and a Mexican promotion firm were contracted. The artists agreed to donate their proceeds to the program. And a song was launched.

So far, 150,000 copies have been sold in Mexico and the song has reached the top of the charts. It is also among the top 20 records in nearly every Spanish-speaking Latin American country, and sales in the United States are brisk.

The program is considered a standout example of applying social marketing techniques (in this case, the pop music scene) to put across a social message (in this case, sexual responsibility), and doing it through the marketplace (record sales and radio). Millions of teens have been reached with the message, at a total initial investment of $300,000. Tatiana and Johnny's next release: "Detente [Wait]." –A.H.

# SURVEY REPORT

## South Korea

South Korea has reached replacement level. A 1985 fertility survey conducted by the Korea Institute for Population and Health shows a total fertility rate (TFR) of about 2.1 lifetime children per woman. In 1966 this rate was 5.4.

The country is one of the few in the less developed world to have reached replacement (a TFR of 2.1) and the decline observed has been quite steady. Unlike the experiences of Costa Rica and Tunisia, official estimates indicate little evidence of a "slowdown" in fertility decline as lower levels were reached.

South Korea's estimated mid-1986 population of 43 million gives the country one of the highest population densities in Asia, 1,139 persons per square mile, a figure exceeded only by Bangladesh.

The survey also found a high prevalence of contraceptive use: 70.4 percent, among married women aged 15-49. It found that contraceptive use had increased steadily, and that past urban/rural differences had almost disappeared.

The acceptance of female sterilization was a marked factor in recent increase. In 1985, 40 percent of all currently married contraceptive users aged 15-44 years had been sterilized, as compared to 28.1 percent in 1982.

This survey summary was published in the March 1986 issue of the Korea Institute for Population and Health's (KIPH) *Bulletin.* –A.H.

# Planning Aging Data Needs

Two Senate bodies are examining how the 1990 Census should cover data on the U.S.'s aged population.

The Subcommittee on Energy, Nuclear Proliferation, and Government Processes (Sen. Thad Cochran, R-Miss., chairman) and the Subcommittee on Aging (Sen. Charles Grassley, R-Iowa, chairman) are jointly holding a one-day conference for this purpose Wednesday, Nov. 12, in Washington, DC. The conference's purpose is to provide guidance for the Census Bureau in formulating the census questionnaire, as part of the Bureau's planning for the 1990 Census, now a scant 3½ years away.

Persons who work with these data are invited to participate. The conference transcript will be published.

For further information, contact: June Walton in Sen. Cochran's office, at (202) 224-9515.

# DEMOGRAPHER'S PAGE

## Census '86: Stocktaking Down Under

**by Kevin McCracken**

On Monday, June 30, 1986, the Australian Bureau of Statistics (ABS) conducted Australia's 11th national census of population and housing. Taken every five years, the counting exercise proceeded without major incident. Starting early 1987 a valuable sociodemographic snapshot of Australian society at mid-decade will begin to pour forth.

Census taking has a long history in Australia. The first formal census was held in the Colony of New South Wales in 1828, though regular population enumerations (known as "musters") were taken before that date. The first national population census in Australia came in 1911. The original census legislation, the Census and Statistics Act passed in 1905, provided for a census every tenth year, but censuses were interrupted by the Depression and World War II. Starting in 1961, censuses have been held every five years (a frequency made law in 1977). Australia is one of only a handful of countries that conducts censuses that often. This could come to an end, however, because the federal government has proposed – and not for the first time – a return to the ten-year pattern.

As in other nations, responses to Australian census questions will provide data essential for the informed planning of education, health care, social security, employment, housing, transport, and numerous other areas touching on the lives of all Australians. Census statistics are also indispensable to the business community for location decision making, product and service planning, marketing, and assessment of company performance.

On the political front, the census provides the basic information for making population estimates at the national, state, and local government levels. These estimates are required for the apportionment among the states of seats in the House of Representatives, the allocation of funds to each state, and the funding of local government authorities. Census data are used in the periodic redrawing of state and federal electoral boundaries as well.

Apart from these uses the census results will be dissected by an army of sociologists, economists, political scientists, demographers, geographers, and other social scientists trying to throw light on virtually every conceivable aspect of the nation's people.

Undercounts, privacy, and other enumeration perils

### Coverage and Accuracy

With the exception of diplomatic personnel, all persons residing in Australia on census night are required to complete the census form. While the goal is 100 percent enumeration, it is clearly impossible to count everybody. By international standards, however, the Australian Census does a good job of counting – the postenumeration survey (PES) of the 1981 Census found a population undercount of only 1.9 percent.

As experienced census data users know, the accuracy of census results is subject to two types of errors: response errors and processing errors. Deliberate misstatement of information is not considered by the ABS to be a major problem. Most response errors are probably unintentional and many are detected in consistency edits during data processing. A system of quality control checks is operated to minimize processing errors. As a result, no significant errors of this nature are known to have made it through to final data release to date.

The main question mark over Australian census accuracy relates to the Aboriginal population. The 1981 Census counts of Aboriginals in New South Wales and Victoria were markedly lower than the 1976 figures and claims of a substantial underenumeration have been voiced by Aboriginal groups and some researchers. The census leaves the determination of aboriginality to the individual and the ABS view is that the 1976 figures were probably overcounts reflecting Aboriginal status and opportunity at that time, and that the 1981 counts were closer to the true numbers.

### Census Content

Australia's Census and Statistics Act specifies certain topics which must be included in the census (e.g. name, sex, age, marital status, birthplace, nationality, religion [the answering of which is optional], occupation, etc.). In addition, the Act allows for "any other prescribed matters." All additional topics recommended for inclusion by the ABS have to be accepted by both Houses of Parliament. The 1986 Census contained 34 questions about persons in the household on census night, three on the household's dwelling, plus one on usual members of the household who were absent on census night. The 1986 Census included a question about people's ancestry, the first time such a question was asked.

At times the recommended topics have run into political trouble. Proposed questions on wage rates and currency in circulation were cut from the 1911 Census by Parliament. More recently, an incoming conservative government, urged on by a vocal private lobby, decided to eliminate the income question from the 1976 Census, but backed off when it found out that several million census forms had already been printed.

For both the 1981 and 1986 Censuses, the ABS invited known data users and the general public to make submissions on topic inclusion and

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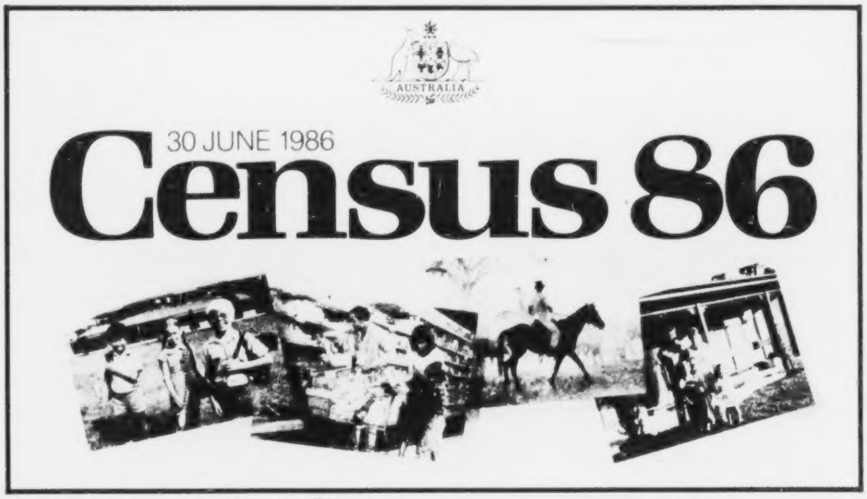


Australian census publicity flyer

exclusion. Three main criteria are used to evaluate proposed topics: the topic must be of sufficient importance, it must be suitable for inclusion in the census, and the census must be the best method of obtaining the information. Basically the concern is to strike a balance between users' needs, public acceptability, and cost considerations.

Despite the thorough evaluation procedure the occasional census question proves to be a flop. For example, concern for the disabled led to a question on handicapped people being included in the 1976 Census. However, the PES content check revealed serious deficiencies in the census responses. When later interviewed in the PES, 60 percent of the people who had reported a handicap in the census stated that they were not handicapped. In addition, many persons who claimed in both the census and the PES that they were disabled gave inconsistent information regarding the type of handicap suffered.

## Privacy and Confidentiality

As in many other Western democratic nations, the Australian public's key concerns regarding the census are those of privacy and confidentiality. What right has the government to require people to answer the census questions? And what guarantee is there that the confidentiality of the personal information obtained will be protected?

The requirement that every person in Australia be included on a census form might be considered an invasion of privacy by some, but this requirement can be justified by the greater good that will flow to society from the information gathered. This justification cuts little ice those unalterably opposed, but when the purposes of the census are explained, most Australians accept it. Also, as the ABS has stated: "The detail of the census information is less than that required of Australians for many other purposes, such as credit facilities, taxations, and social welfare."

The ABS takes pains to ensure the privacy of census participants, including the provision of the "privacy envelope" which any citizen can request in the instance that he is acquainted with the census collector at his doorstep. All census officials (permanent and temporary) are sworn to secrecy under the provisions of the Census and Statistics Act. No census worker is allowed to divulge personal census information, either to individuals or other government departments. Offenders are subject to prosecution.

Names and addresses are deleted when the data from each census form are transferred onto computer files. Once all data have been processed the census forms are destroyed. As a further safeguard, random confidentializing adjustments are made to the more detailed tabulations to avoid inadvertently releasing information which could identify a particular person.

The practice of destroying the census forms is an issue of some debate. Critics argue that it needlessly deprives future generations of invaluable historical information – in the words of one commentator, a policy of "informicide." In a report on privacy and the census commissioned by the federal government, the Australian Law Reform Commission in 1979 recommended that identified census information be retained, with access for most purposes being forbidden for 75 years. The government, however, has rejected this view, holding "there is strong evidence that many Australians want absolute confidentiality to be maintained at all costs," and all 1986 Census forms, as in the past, will be destroyed after processing.

## The Next Census?

When will the next Australian population census be held? Under normal circumstances the answer would be 1991. However, the federal government has recently instructed the ABS to consider the implications of changing from a quinquennial to a decennial census.

Proponents of the ten-year census will no doubt press the budgetary savings line and argue that the ABS' population survey program could be developed to meet the nation's data needs. However, opponents charge that the survey program would have to be expanded massively in content and sample size in any genuine attempt to fill the data gap. That aside, it is unlikely that surveys could produce sufficiently detailed and accurate information at the small area level required by many data users.

*Continued on page 8*

## Australian Census

*Continued from preceding page*

This has been the ABS stance in the past. In its submission to the Law Reform Commission's privacy inquiry it argued strongly that the statistics generated from the census could not equally be obtained from a sample of the population, and this view was accepted by the Commission. Likewise, in a recent paper outlining and justifying the topics in the 1986 Census, the ABS stated that the data needed at small area level and for small subgroups of the population can be obtained only through the census. Census data users will have to wait and see whether economics and government prodding will produce an about-face.

# Sterilization: Number 1 Method

Some 100 million couples around the world rely on surgical sterilization to prevent pregnancy as of 1985. Sterilization continues to be the world's most popular family planning method.

The highest levels are seen in Puerto Rico, where 46 percent of married women of reproductive age are protected by sterilization, and in the U.S., where the level is 39 percent, including women who have had hysterectomies. In the developing world, prevalence is high, e.g., in Panama (30 percent of reproductive-age couples protected by sterilization), in Korea (28 percent) and China (nearly 25 percent). In 1982, India's prevalence was found to be about 21 percent. In short, in many less developed countries, anywhere from one-fifth to nearly half of all couples of reproductive age are sterilized.

Far more female than male sterilizations are performed each year; only in a few countries are vasectomies anywhere near as common as tubal ligations.

The results, summarized in the Alan Guttmacher Institute's *International Family Planning Perspectives,* come from a factbook prepared by John A. Ross, Douglas H. Huber, and Suwon Hong, published in 1985 by the Association for Voluntary Surgical Contraception. *–A.H.*

## Media Event

*Continued from page 3*

the study's authors. "You can't talk about this nonmarriage trend looking at women alone," says Bennett. "The fact that they haven't married may be due to men maintaining a sexist position, demanding sacrifices of women that they would never make themselves," such as interrupting a career to raise children or relocating to another city.

As the study points out, women today are less motivated to marry than ever before. The need and desire for economic support prompted women to marry in the past – but that factor has been all but eliminated for career women today. Meanwhile, contraception, legal abortion, and relaxed social taboos on single parenthood have made childbearing a less compelling reason for marriage.

In short, the authors say, women today don't "need" marriage as they once did, though the widespread reaction to the study's conclusions indicates that marriage is an important topic to women today.

The story even made the foreign press, with articles appearing in the *Jakarta Post* and the *South China Morning Post.* Back in the U.S. *People* magazine jumped on the bandwagon with an article in their March 31 issue asking the burning question "old maids?" about glamorous, aging, unmarried female celebrities. The article carried a picture of the study's authors. The June 23 issue of *People* pictured glamorous, aging, unmarried male celebrities, branding them as "holdouts."

Just as the authors didn't expect their study to receive the media hype it did, they did not foresee the extent to which it would be misinterpreted. "My main gripe is that so much of the press has taken the angle that women who aren't married are dejected, unfulfilled human beings," says Bennett. Many of the articles "assume marriage is a measure of success" for women, he asserts.

Unhappily for the authors, this "anti-woman" attitude has been attributed to the study, which the magazines insisted upon referring to as "the Yale-Harvard" study. The result was a media backlash of sorts. A spate of articles about the study appeared in August and September issues of many women's magazines. In general, these articles sought to reassure women that hope for marriage is not lost. They range from attempts to clarify the study's findings, such as "Who Will and Who Won't Get Married: A Sensible Look at the 'Man Shortage'" which appeared in the August issue of *Self,* to "Exploding the Male-Shortage Myth: Debunking the Yale-Harvard Report . . ." in the September *New Woman.* Similar articles appeared in, among other periodicals, *Ms.* ("Who's Winding the Matrimonial Clock?") and *Mademoiselle* ("The Great American Man Shortage: Whatta Lie").

### Why Marriage?

Why this study? Certainly many other demographic topics deserve equal, if not more extensive, treatment than the marriage patterns of American women. "As far as other demographic issues go, in no way did this study deserve all the attention it received," says Bennett, adding that other population-related topics, such as the recent study on population and development by the National Academy of Sciences or the world's high rates of infant mortality merit, but do not receive, national media attention. "I am glad that people are discussing the issue and that a demographic, socioeconomic study has come to the fore."

Once in a blue moon
the media seize on a
demographic topic
and turn it into an
event.

"Marriage Patterns in the United States" serves as an example of both the triumphs and pitfalls of national attention. Whereas Bennett, Bloom, and Craig had the opportunity to enjoy some notoriety, the media spotlight was harsh. Bennett says it was fun while it lasted, but he doesn't want to be part of the media circus again very soon. "It was very exciting, but time consuming." *–J.A.*

# LETTER TO THE EDITOR

I regret to inform you that there were a number of factual errors and at least two important omissions in your Spotlight on Poland (*Population Today*, November 1985).

1. Since the 1815 estimate for the present territory also included non-Polish population, the statement that "the Polish population tripled during the subsequent century" is not accurate.

2. The "part of Germany" included in post-World War I Poland was in fact an area earlier captured by Prussia during partitions of Poland in the 18th century, but if you insist on mentioning Germany, one could also argue that parts of Austria and Russia were incorporated in newly established Poland.

3. According to the 1931 Census, based on mother tongue the number of ethnic Germans was 740,000 (or 2.3 percent), and Ukrainians (and Ruthenians) were estimated at 4,440,000 (or 13.9 percent). There were also 2,730,000 Jews (8.6 percent). Calculated on religion rather than mother tongue, the number of Jews was 3,114,000 (9.8 percent).

4. Poland was invaded in 1939 by both Nazi Germany (Sept. 1) and the Soviet Union (Sept. 17), and the country's losses and suffering during World War II were not only caused by the Germans.

5. The post-WWII flight of Germans included not only former Polish citizens and those who relocated in Poland during the war but also those from the areas east of the Oder-Neisse line, the post-WWII border drawn by the Potsdam conference between East Germany and Poland. The latter category was also included in the forced transfers of Germans. The total number of expellees from Poland (including those who fled earlier) counted in East and West Germany in 1946 was already much higher – 5,600,000.

6. The large influx of 3 million Poles who returned after World War II consisted almost exclusively of persons who were *forcibly removed* to the West by the Nazis. These were POWs, forced laborers, inmates of concentration camps, and even kidnapped children. Hardly any of them "fled the country during the war."

7. Two other important and massive migration flows were not mentioned. Deportations by the Soviets from their zone of occupation from 1939 to 1941 affected at least 1 million persons, and only some survivors of this deportation eventually returned. Secondly, the repopulation of newly acquired northern and western territories involved not only "repatriates" from lost territories but also some 3 million who came from central Poland (1946-1950).

—*L.A. Kosinski*
*Professor of Geography*
*University of Alberta*
*Edmonton, Canada*

# POPULATION UPDATE

## Estimated United States Population:

| | |
|---|---|
| As of April 1, 1986 | 240,952,000 |
| As of April 1, 1985 | 238,709,000 |

The above estimates include armed forces overseas and are from U.S. Bureau of the Census, Current Population Reports, Series P-25, No. 988.

## Estimated World Population:

| | |
|---|---|
| As of September 1986 | 4,956,000,000 |
| Annual growth | 83,000,000 |

Estimated by extrapolation of the mid-1986 world population given on PRB's 1986 World Population Data Sheet.

## Latest Provisional Statistics for the U.S.: April 1986

| | 12 months ending with April | | | | | |
|---|---|---|---|---|---|---|
| | Number | | Rate | | | |
| Item | 1986 | 1985 | 1986 | 1985 | 1984 | 1983 |
| Live births | 3,752,000 | 3,709,000 | 15.7 | 15.7 | 15.5 | 15.9 |
| Deaths | 2,078,000 | 2,080,000 | 8.7 | 8.8 | 8.6 | 8.6 |
| Natural increase | 1,674,000 | 1,629,000 | 7.0 | 6.9 | 6.9 | 7.3 |
| Marriages | 2,429,000 | 2,468,000 | 10.2 | 10.4 | 10.4 | 10.7 |
| Divorces | 1,184,000 | 1,166,000 | 5.0 | 4.9 | 4.9 | 5.1 |
| Infant deaths | 39,100 | 39,400 | 10.5 | 10.6 | 10.8 | 11.1 |
| Population base (in millions) | | | 239.1 | 236.9 | 234.5 | 232.3 |

*Note.* Rates are given per 1,000 population, except for infant deaths, which are given per 1,000 live births.

*Source. Monthly Vital Statistics Report* (Vol. 35, No. 4) from the National Center for Health Statistics.

# POSITIONS/ PROFESSIONALS

**Senior Demographer,** the Population Reference Bureau, Inc., to head its Dept. of Policy Studies. Applicants should demonstrate achievement in policy-oriented, applied research on an important U.S. population issue such as immigration, aging, or population distribution, and have some experience in administration. The head of the Policy Studies Dept. reports to the President of PRB and is responsible for managing the activities of the department's staff as well as PRB's policy-oriented publications, internships, and Visiting Scholar Programs. Salary is dependent on qualifications; PRB offers generous benefits, including TIAA/CREF.

Women, members of minority groups, and handicapped persons are encouraged to apply. PRB is an Affirmative Action, Equal Opportunity Employer.

Applicants should send a curriculum vitae, reprints of relevant publications, and a salary history to Tom Merrick, President, Population Reference Bureau, Inc., 777 14th St. N.W., #800, Washington, D.C. 20005.

# SOFTWHERE

**POPTRAN** is a software package designed to help students learn the basics of population statistics and compare countries. Its programs include: Population Pyramids, Population Projections, Population Dynamics, Population Policy, and Determinants of Fertility.

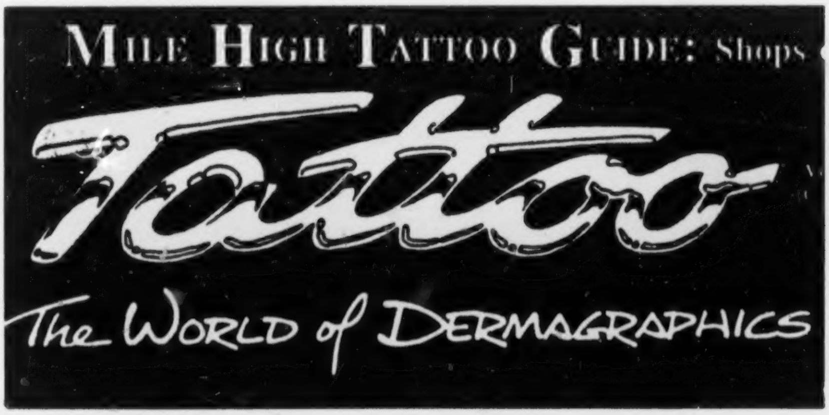
POPTRAN runs on an Apple II+ or Apple IIe microcomputer. The package includes 9 program disks, 15 data disks, and manuals. Price: 350 British pounds (US dollar rate subject to exchange fluctuations). For more information contact: Steve Kinzett, POPTRAN, Cardiff University Population Centre, University College, P.O. Box 78, Cardiff CF1 1XL, United Kingdom. *–K.C.*

# TAKE A NUMBER

**Frisco shakes up Philly:** The population of the San Francisco metropolitan area is estimated to have passed Philadelphia's in 1985, according to the U.S. Census Bureau. The "city by the sea" grew by 8.2 percent since the 1980 Census, easily snatching the coveted Number 4 spot from the "cradle of liberty," by reason of its growth of 8.2 percent since the 1980 Census, easily besting its displaced rival's 1.7 percent. The San Francisco metro area population in 1985 stood at 5,809,300 according to the Bureau's estimates, while Philadelphia's was 5,776,500. But Philly can take some solace in that Philadelphia *city* is far larger than San Francisco city, 1,647,000 to 713,000 (1984 estimates).

**Here and There...** Vietnam reports that efforts to address its "serious, alarming, and urgent" population problem have brought results; the number of Vietnamese women bearing a third child has dropped from 50 to 30 percent...on a geographic note, *Newsweek* reported that U.S. students' knowledge has deteriorated to the point where some North Carolina college students thought that Africa was north of the U.S., Cape Cod and Florida were one and the same, and Dublin, Ireland was south of Lake Erie. And, the Monroe Doctrine would be slightly bruised if the USSR were adjacent to Panama, as some thought...Singapore is worried that its policy to reduce population growth has been too successful; a long article in the *Straits Times* (Aug. 5) worried that the level of birth required for population stabilization, 50,000, was not reached in 1985, that the better educated woman has fertility 40 percent below replacement level, and that serious economic problems may result. This article also marks one of the *very* few times that news of a gross reproduction rate makes page-one news of any major daily... the U.S. farm population fell by 400,000 in 1985, to 5.3 million, the first major loss in a decade; further losses are expected in the Midwestern farm population, where 60 percent of farms in financial trouble are located... preliminary reports from West Germany indicate that the number of births may have leveled off for the first time since 1964 at 304,000 for the first six months of 1986 (*Frankfurter Zeitung*). *–C.H.*

# ADDENDA



Published in Redondo, Calif., *Tattoo* magazine boasts that it covers "the world of dermagraphics." As you'll recall, that's Whipple's Index inked upon the inside of a desperate student's wrist.

# CURRENT READINGS

*PRB welcomes materials on population topics for possible inclusion in Current Readings. Publishers may address review copies to Book Review Editor, POPULATION TODAY, Population Reference Bureau, 777 14th St., N.W., Washington, D.C. 20005.*

**NATURAL DISASTERS: The Human Connection.** A Cox Newspapers Special Report, 1986. 32 pages. (Available from Cox Newspapers, P.O. Box 4689, Atlanta, Ga. 30302.)

This tabloid supplement reprints a major Cox Newspaper series on Third World developmental, environmental, and population-growth problems – news categories usually covered piecemeal, if at all, by U.S. media. Taken together, the articles make the case that the increased tempo of human disasters in recent years has been exacerbated by "acts of man – unrestrained population growth, shoddy construction, poor land use planning, overgrazing, overcultivation, deforestation – that are forcing people into areas where they are more vulnerable to calamities."

*– Art Haupt*

**OUR AGING SOCIETY: Paradox and Promise,** edited by Alan Pifer and Lydia Bronte. New York: Norton, 1986. 413 pages. $22.95 ISBN 0-393-30334-9; paper $12.95.

Following the baby boom – and partly because of it – a demographic trend inexorably reshaping U.S. society is the aging of the population. With continuing gains in life expectancy and low fertility, the proportion of persons aged 65 and over, now 12 percent, will rise to at least 20 percent in 2030 and could be as high as 36 percent in 2050, say demographers Jacob Siegel and Cynthia Taeuber in their contribution to this thoughtful collection of 18 essays, commissioned by the Carnegie Corporation's Aging Society Project. By 2030 the U.S.'s population age structure will be "rectangularized," with almost equal proportions in each five-year age group up to age 70.

Distinguishing the U.S.'s aging from that of other Western nations is the "demographic twist" of baby boom followed by baby bust, says co-editor Alan Pifer. In 2030, when all baby boomers are over 65, there will be 39 persons in that age group for every 100 in the prime working ages (20-64), double the current ratio, and providing for their support "will be as great a challenge as any the nation has ever faced."

But the book goes far beyond baby boomers to explore the impact of the aging of the American population on people and institutions. Will children become a treasured resource or a forgotten minority as their numbers and proportion shrink? What lies in store for women, who are the "kin keepers" and far outnumber men at the oldest ages? Will the elderly's needs intensify intergenerational competition and overwhelm heath-care and retirement resources? Is age 65 outdated as a marker of "old age" and retirement and should life plans and public policies be geared instead to a newly productive, option-rich "third quarter of life" from age 50 to 75?

The provocative answers to such questions demonstrate that population aging does indeed "carry the promise of a far better U.S. society or, paradoxically, a far worse one."

*– Jean van der Tak*

**THE FEAR OF POPULATION DECLINE,** by Michael Teitelbaum and Jay M. Winter. Orlando: Fla.: Academic Press, 1985. 201 pages. $34.00; $19.95 paper. ISBN 0-12-685190-5.

Fertility in many industrialized countries has dropped below replacement level in recent years, and the alleged implications of this trend toward population decline have engendered an increasingly heated debate. Teitelbaum shows that nations tend to view this trend in political terms, apparently equating power with numbers. Phrases such as "autogenicide," and "depopulation as unilateral disarmament," as well as public statements by French leaders and German pronatalist manifestos all exemplify the "fear" of the book's title.

The author concludes that ironically, by the time a demographically alarmed government feels the need to revive a nation's faltering fertility, citizens' proven ability to delay or prevent their childbearing tends to make government intervention moot.

*– Alexander von Cube*

## Books Received

**THE BIOLOGY OF HUMAN AGEING,** edited by A.H. Bittles and K.J. Collins. (Proceedings of a two-day symposium held at Chelsea College, University of London, April 1984.) Cambridge, England: Cambridge University Press, 1986. 280 pages.

**DETERMINANTS OF MORTALITY CHANGE AND DIFFERENTIALS IN DEVELOPING COUNTRIES: The Five-Country Case Study Project.** (Population Studies, No. 94) by the Dept. of International and Economic and Social Affairs. New York: United Nations. 1986. 170 pages.

**HUNGER AND HISTORY: The Impact of Changing Food Production and Consumption Patterns on Society,** edited by Robert I. Rotberg and Theodore K. Rabb. Cambridge, England: Cambridge University Press, 1985. 336 pages.

**POLISH PEOPLE AND CULTURE IN AUSTRALIA,** edited by Roland Sussex and Jerzy Zubrzycki. Canberra, Australia: The Australian National University, 1985. 223 pages.

**POPULATION GROWTH AND POLICIES IN MEGA-CITIES: Seoul.** Population Policy Paper No.4 (ST/ESA/SER.R/64), by Dept. of International Economic and Social Affairs. New York: United Nations, 1986. 56 pages.

**POPULATION STRUCTURES AND MODELS: Developments in Spatial Demography,** edited by Robert Woods and Philip Rees. Winchester, Mass.: Allen & Unwin, 1986. 417 pages. $50.00

**YEARBOOK OF LABOR STATISTICS 1985** (45th issue), by the International Labour Office. Geneva, Switzerland: ILO, 1985. 951 pages.

# NEPAL

**Population (mid-1986 estimate): 17.4 million**
**Land area: 56,827 sq. miles**
**Births per 1,000 pop. (1986 est.): 42**
**Deaths per 1,000 pop. (1986 est.): 18**
**Rate of natural increase (1986): 2.3 percent**
**Total fertility rate: 6.3 births per woman**
**Infant mortality rate (1981): 139 infant deaths per 1,000 live births**
**Life expectancy: 46 years**
**Literacy rate (1981): 23 percent**
**Urban population: 7 percent**
**Per capita income (1984): US $160**
**Major exports: rice, wheat, and other agricultural products**
**Major imports: consumer goods and construction materials**
**Capital: Kathmandu**

**by Nav Raj Kanel**

Nepal is a landlocked kingdom sandwiched between India and China. Its area is about that of Michigan. Some 83 percent of the total land area consists of high mountains and rolling hills, while the remaining 17 percent is flat land called the Terai. The altitude varies from 500 feet above sea level in the Terai to the 29,028 feet of Mt. Everest in the Himalayas.

Nepal's 1981 Census counted a population of 15.0 million. The estimated mid-1986 population is about 17.4 million. The majority of the population lives in hilly areas and in the Terai. Since Nepal is basically an agricultural country, people from the hills now tend to migrate to the Terai for more, and better, land.

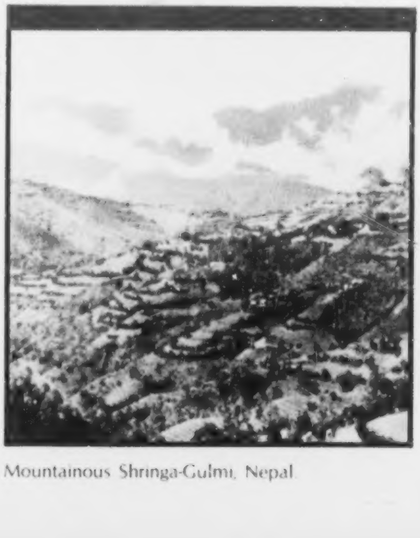
While the 1981 Census showed Nepal's rate of natural increase as 2.3 percent, the country gains another 0.3 percent a year through net migration. Immigration comes almost exclusively from India over the open border between the two countries.

These immigrants also tend to settle in the Terai, causing that border region's growth rate to be much higher than the national level. (Since Nepal did not collect any data about foreign immigrants in its 1981 Census, their actual number is not known.)

Nepal is the only officially declared Hindu country in the world. About 90 percent of the population is Hindu, 5 percent Buddhist, and the rest divided into small groups of Muslims and others. There are two main ethnic categories in the Nepalese population – Indo-Nepalese (about 80 percent), and Tibeto-Nepalese (about 20 percent) representing substantial intermixture of Indo-Aryan and Mongolian racial strains. However, the country is divided into many quasi-tribal communities.

Nepali is the national and official language of Nepal. It is written in Devanagari script (as is Sanskrit). Nepali is the mother tongue of about 60 percent of the population. In addition, there are 20 other languages divided into different dialects. Nevertheless, more than 90 percent of the population can communicate in Nepali.

Agriculture is the base of the national economy. About 93 percent of the population is engaged in agriculture and allied activities. Fifty-nine percent of the total gross domestic product and 65 percent of the total exports come from this sector. The economic growth rate is only 2.7 percent per year (as of 1983). Because population is growing at 2.6 percent, per capita income growth works out to a (negligible) rate of 0.1 percent per year.



Nav Kanel

Mountainous Shringa-Gulmi, Nepal

Nepal's rapid population growth also means that its population is quite young – the median age being about 19 years, and the age-dependency ratio, 89. (The age-dependency ratio is the ratio of persons in the "dependent" ages [under 15 and over 60 years] to 100 of those in the "economically productive" ages [15-59 years.])

About 7 percent of married couples use contraceptives. A majority of the people of childbearing age have not been able to use contraceptives because they are not easily and cheaply available.

Unlike many other countries, Nepal's rural-to-rural migration is significant, with many people migrating from the hills to the Terai in order to farm (rice and wheat, principally). The level of urbanization is very low – only 7 percent. However, some cities, such as Kathmandu and Mahendranagar, are mushrooming.

Demographically as well as economically, Nepal is typical of many less developed countries with its high TFR, birth rate and death rate, high infant mortality rate and low life expectancy (life expectancy at birth is 47.5 years for males and 44.5 years for females).

The present high population growth poses many problems in Nepal – economic, social, technological, and environmental. Because of the agricultural economy and the country's rapid population growth, deforestation is occurring at an alarming rate, causing landslides in hilly areas and floods in the Terai.

Nepal has an official government policy to reduce the population growth rate with support of family planning, for development reasons as well as reasons of health and human rights. Nevertheless, family planning programs currently reach only a small proportion of the population. And if growth continues at present rates, Nepal's population by 2000 could be 24.6 million – very high for a country in its economic and geographic situation.

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